

8-29-2016

A Case Study of the Impact of Peer-to-Peer Mentoring on Mentors in a Rural High School Setting

Darlene M. Geddes
Concordia University - Portland, mrsdgeddes@gmail.com

Follow this and additional works at: https://digitalcommons.csp.edu/cup_commons_grad_edd



Part of the [Curriculum and Social Inquiry Commons](#), and the [Other Education Commons](#)

Recommended Citation

Geddes, D. M. (2016). *A Case Study of the Impact of Peer-to-Peer Mentoring on Mentors in a Rural High School Setting* (Thesis, Concordia University, St. Paul). Retrieved from https://digitalcommons.csp.edu/cup_commons_grad_edd/48

This Dissertation is brought to you for free and open access by the Concordia University Portland Graduate Research at DigitalCommons@CSP. It has been accepted for inclusion in CUP Ed.D. Dissertations by an authorized administrator of DigitalCommons@CSP. For more information, please contact digitalcommons@csp.edu.

8-29-2016

A Case Study of the Impact of Peer-to-Peer Mentoring on Mentors in a Rural High School Setting

Darlene M. Geddes

Concordia University - Portland

Follow this and additional works at: <https://commons.cu-portland.edu/edudissertations>



Part of the [Curriculum and Social Inquiry Commons](#), and the [Other Education Commons](#)

CU Commons Citation

Geddes, Darlene M., "A Case Study of the Impact of Peer-to-Peer Mentoring on Mentors in a Rural High School Setting" (2016). *Ed.D. Dissertations*. 2.

<https://commons.cu-portland.edu/edudissertations/2>

This Open Access Dissertation is brought to you for free and open access by the Graduate Theses & Dissertations at CU Commons. It has been accepted for inclusion in Ed.D. Dissertations by an authorized administrator of CU Commons. For more information, please contact libraryadmin@cu-portland.edu.

Concordia University – Portland

College of Education

Doctorate of Education Program

WE, THE UNDERSIGNED MEMBERS OF THE DISSERTATION COMMITTEE
CERTIFY THAT WE HAVE READ AND APPROVE THE DISSERTATION OF

Darlene Marie Geddes

CANDIDATE FOR THE DEGREE OF DOCTOR OF EDUCATION

Marty A. Bullis, Ph.D., Faculty Chair Dissertation Committee

Erin Mueller, Ph.D., Content Specialist

Cindy Coe, Ed.D., Content Reader

ACCEPTED BY

Joe Mannion, Ed.D.
Provost, Concordia University – Portland

Sheryl Reinisch, Ed.D.
Dean, College of Education, Concordia University – Portland

Jerry McGuire, Ph.D.
Director of Doctoral Studies, Concordia University – Portland

A Case Study of the Impact of Peer-to-Peer Mentoring on
Mentors in a Rural High School Setting

Darlene Geddes, Ed.D.

Concordia University – Portland

College of Education

Dissertation submitted to the Faculty of the College of Education
in partial fulfillment of the requirements for the degree of
Doctor of Education in Educational Leadership

Marty A. Bullis, Ph.D., Faculty Chair Dissertation Committee

Erin Mueller, Ph.D., Content Specialist

Cindy Coe, Ed.D., Content Reader

Concordia University – Portland

ABSTRACT

Existing research on peer-to-peer mentoring has focused mainly on cross-age peer mentoring with several years' difference between mentor and mentees (Karcher, 2005, 2007; Lawon, 2014; Willis, Bland, Manka, & Craft, 2012) and the impact of peer mentoring on the mentee. I aimed to examine the relationship of participating in a high school based peer-to-peer mentoring program and the impact on the high school upperclassmen mentors in this study. School is a social organization where peers can develop school connectedness and expand their prosocial skills and through their social networks increase social capital. The impact of peer mentoring programs on high school peer mentors is an area that has not been sufficiently investigated. The current exploratory case study used data from surveys, interviews, and field notes to understand the experiences of mentors and the impact of peer mentoring in a high school mentoring program on these mentors in terms of their school connectedness, social capital, and prosocial skill development. Researchers have identified increases in mentees who are involved in peer mentoring programs (Karcher, 2005, 2007). Further research is needed to investigate the impact of these social connections on high school peer mentors. In this study, data was collected from the Hemingway Survey, mentor interviews, and field notes. Findings of this study support the conclusion that the peer mentors' prosocial skills of school involvement, school connection, and social capital increased as a result of participating in a peer-to-peer mentoring program. Additionally, mentors did not report identifiable differences between matches that were same gender or different genders. Results from this study demonstrate the impact of increases in the development of prosocial skills and social capital in peer mentors.

Keywords: peer mentoring, social capital, school connectedness, prosocial skills

DEDICATION

This work is dedicated to all my students. My students, past and present, are my inspiration.

ACKNOWLEDGMENTS

I wish to express my deepest gratitude to my advisor and the chair of committee, Dr. Marty A. Bullis for his patience and encouragement throughout my dissertation process. He exemplifies the true spirit of a mentor. Likewise, additional gratitude and special appreciation is due to my other committee members Dr. Erin Mueller and Dr. Cindy Coe for their support and assistance in this project. Appreciation is due to several individuals without whose help this study would have never have been completed: Dr. Jerry McGuire, Dr. Angela Owusu-Ansah, Dr. Anne Grey, Steve Spencer, Kelli McGuire, Julie Schneidecker, and Jessica Lowry. To my editor, encourager, and dearest friend, Bob Bizjak, you are a blessing to me. I would also like to thank my family for their patience, encouragement and love which has remained constant throughout my life. Finally, I wish to thank God for providing the perfect example of teaching through mentorship to His people.

Table of Contents

ABSTRACT.....	ii
DEDICATION.....	iii
ACKNOWLEDGMENTS	iv
LIST OF FIGURES.....	ix
LIST OF TABLES.....	x
Chapter 1: Introduction	1
Introduction to the Problem	1
Background, Context, History, and Conceptual Framework for the Problem.....	3
Purpose of the Study.....	9
Research Questions	9
Sub-Questions	10
Rationale, Relevance, and Significance of the Study	10
Nature of the Study	13
Definitions of Terms	13
Assumptions and Limitations	15
Chapter 1 Summary	16
Chapter 2: Literature Review.....	18
Historical Foundations of Mentoring.....	18
Conceptual Framework.....	21
Psychosocial Theoretical Frameworks	22
Erikson	22
Coleman	23
Bandura.....	25
Gilligan	28

Review of the Research Literature and Methodological Literature.....	29
Common Forms of Mentoring	29
School-based Mentoring	34
Psychosocial Outcomes	36
Synthesis of Research Findings	43
Critique of Previous Research	45
Chapter 2 Summary	46
Chapter 3: Methodology	48
Introduction to the Research Design.....	48
Research Design.....	48
Purpose of the Study	49
Research Question	51
Sub-Questions	51
Research Design.....	51
Target Population, Sampling Method, and Related Procedures	53
Instrumentation	56
Data Collection	56
Data Analysis Procedures	57
Limitations of the Research Design.....	61
Expected Findings.....	61
Ethical Issues.....	62
Chapter 3 Summary	65
Chapter 4: Data Analysis and Results.....	66
Introduction to Chapter 4.....	66
Brief Overview.....	66

Description of Purpose.....	67
Overview Description of Data Analysis, Results, and Findings.....	68
Researcher’s Role	68
Description of the Sample.....	69
Research Methodology and Analysis.....	74
Description of Analysis Method’s Fit for the Study	74
Case Study.....	75
Hemingway Survey Analysis.....	79
Other Sources of Data	80
Protections of Participants	81
Coding Process Overview.....	82
Creation of Pre-Set Codes.....	82
Emergent Categories	83
Organizing and Verifying the Data.....	83
ATLAS.ti Categories	86
Stage 1A: Mentors’ Responses	92
Stage 1B: Describing and Interpreting Mentors’ Experiences	92
Stage 2: Analyzing the Interview.....	93
Stage 2A: Describing the Content of the Categories	95
Stage 2B: Describing and Interpreting Mentors’ Perspectives	95
Stage 3: Combining Results of the Previous Steps.....	96
Results and Analysis	97
Research Question One.....	97
Research Question Two	104
Research Sub-Question A.....	109

Research Sub-Question B	113
Research Sub-Question C	118
Chapter 4 Summary of the Findings	121
Chapter 5: Discussion and Conclusion	124
Introduction to Chapter 5	124
Summary of the Results	126
Sub-Questions	127
Discussion of the Results	130
Discussion of the Results in Relation to the Literature.....	136
Limitations.....	144
Implications of the Results for Practice, Policy, and Theory	146
Recommendations for Future Research	148
Chapter 5 Summary	151
References.....	152
APPENDICES	178
APPENDIX A: Mentor Application	178
APPENDIX B: Informed Consent Form	181
APPENDIX C: Timeline of Events	184
APPENDIX D: Field Notes Template	186
APPENDIX E: Interview Questions and Protocol.....	187
APPENDIX F: The Hemingway Measure of Adolescent Connectedness.....	189
APPENDIX G: Mentor Recruitment Flyer.....	191

LIST OF FIGURES

Figure 1	Triangulation by Method.....	85
Figure 2	Relationship Development.....	92
Figure 3	Initial Codes	192
Figure 4	Final Codes	193
Figure 5	Student Leadership and Social Capital	194
Figure 6	School Connection through Activities and Social Capital.....	195
Figure 7	Belonging/Sense of Family and School Connection through Activities	196
Figure 8	Relationship and Servant Leadership.....	197
Figure 9	Social Capital and Awareness of Others' Needs	198
Figure 10	Relationship and Social Capital	199

LIST OF TABLES

TABLE 1	Mentor/Mentee Configurations.....	74
TABLE 2	Means and Standard Deviations Scores for Peer, Self-in-Present, and Connectedness to Neighborhood	80

Chapter 1: Introduction

Introduction to the Problem

High school marks a shift in which students are experiencing more independence yet, there are significant declines in supports designed for student success once they enter high school. Researchers at the Consortium on Chicago School Research have suggested as students transition from middle school to high school they experience shifts in their school environments different from their previous school experiences (Roderick, 2006). First, incoming ninth grade students' school schedules shift with increased number of classes and teachers. Second, the size of their school increases from the middle school setting. Finally, their peer group size can increase, significantly expanding the number of peers that they know and have contact with on a daily basis. For students who are already identified as at-risk, this transition may depend upon additional supports to ensure a successful high school experience. Currently, there are Link Crew programs in some American high schools. These programs serve just over 2,000 schools of approximately 26,000, showing that there is still a need for transition programs for incoming high school freshman ("Link Crew's Reach," n.d.). Through the Link Crew programs, upperclassmen implement a one-day orientation training day which provides all freshmen a tour of the school, a quick review of the basic rules and a few "getting to know you" activities. For a majority of freshman, this orientation day is a fun day that begins their initiation into connecting to their high school home. For students who are socially at-risk, the information can be overwhelming, they may feel more confused, and lost in the larger high school setting before the year begins. Another component of Link Crew can include cross-age peer mentoring. With cross-age peer mentoring high school mentors assist in building personal skills and self-confidence that may help in preparing youth for their lives in high school and beyond (Garringer & MacRae, 2008). For other schools throughout the nation, high school students rely on student

leadership groups to organize a transition program similar to Link Crew. Still others have shorter morning orientation or advisory classes to show freshman their new schools. “Incoming freshman face navigating a new school, making new friends in unfamiliar classes, and getting to know new teachers” (Winters, 2013). All of the academic, social, and behavioral expectations may feel overwhelming without having an older, more experienced student assisting them (Karcher, 2007).

Cross-age peer-to-peer mentoring at the high school setting is a viable way to utilize a resource available in schools, by having more experienced students helping less experienced students. Here, upperclassmen provide incoming students with the information and support that they need in order to navigate this new environment in a proactive and prosocial manner. Additionally, peer-to-peer mentoring opportunities can build the leadership capacity of upperclassmen which encourages their school connection, prosocial behaviors, and involvement in human and social capital (Garringer & MacRae, 2008; Karcher, 2007). Peer-to-peer mentoring programs provide opportunities for youth to network with others, build leadership skills, and increase school connections. Karnes and Beanem (2010) explain that “it is clear that more serious attention should be given to developing young leaders—influential people who are critical thinkers, creative problems solver, and strong communicators” (p. vii). Peer mentoring develops leadership skills and allows youth to practice critical skills necessary for academic and social success.

Helms and Marcelo (2007) analyzed volunteering across states and age groups between 2002 and 2006 and found that 8% of high school graduates who did not attend college reported some kind of volunteer activity, compared with 31% of college graduates, 26% of current college students, and 23% of young people who had some college experience but were not currently

enrolled. Marcelo (2007) determined that it is evident that high school programming does not currently produce graduates who have high rates of voting or volunteering. Also, significant, was that Oregon had the largest decrease-16 percentage points (Helm & Marcelo, 2007). Peer-to-peer mentoring may utilize social capital already accessible and provide opportunities for upperclassmen to build leadership capacity prior to graduation.

The research study that is presented in this dissertation was designed to provide greater understanding of matches between peer-to-peer mentors and mentees at the high school level. I initially sought to understand the effectiveness of different mentoring matches and the impact of mentoring. The research presents the perspectives and experiences of peer mentors at the high school level with regard to their sense of connection to the school, their overall perception of their engagement in prosocial activities, and their involvement in building social capital.

Background, Context, History, and Conceptual Framework for the Problem

Mentoring relationships have long been utilized to provide a framework in which either formal or informal relationships are structured so that one individual supports, encourages, and advises another. Mentoring in the United States has been documented over the past 200 years in a variety of structures and organizations. Formal mentoring programs in the United States were established in the mid-to-late 1800s to assist individuals with daily trials related to joblessness, poverty, and immigration (Freedman, 2008). Although the type, format, purpose, length, and nature of the type of relationship may vary, mentoring can be found in the literature from many disciplines: art, music, business, community service, education, and science. In the field of education, mentors have been used to support beginning teachers, college freshmen, gifted students, at-risk students, and special needs students (Brown, 1995).

During the past two decades, mentoring of youth in various school settings has given rise to a variety of different types of programs promoting the success of adolescents (Rhodes, 2001).

Within the high school setting considered for this study, the opportunity for peer-to-peer mentoring relationships allows for more experienced youth to provide support and guidance to less experienced youth as they transition into the high school setting. Based on the research, students are more likely to connect with and have regular contact with their peers allowing for natural relationships to occur during the transition process. Peer relationships are easier for students to establish and maintain due to the frequency of contact and close proximity (Bukowski, Newcomb, & Hartup, 1996). For the mentors, the cross-age peer mentoring allows the upperclassmen opportunities to build self-confidence, decision-making, planning and personal leadership. Komives, Nance, and McMahon (2007) share that peer-to-peer interactions also can promote leadership and personal empowerment. Garringer and MacRae (2008) have indicated that peers are more likely to engage with other peers than adults. Based on these descriptions and claims, it is fair to conclude that peer mentoring provides significant social support to high school youth.

Each high school setting has its own set of academic, social, and behavioral expectations. Certain school districts may ascribe to similar expectations; however, there are different nuances from school to school, district to district, and state to state. The academic expectations are different than those found in elementary and middle school. “Expectations are part of the culture that plays a particularly powerful role in school. Expectations are grounded not only in each individual’s experiences but in how each individual interprets experiences” (Osher, Sprague, Weisseberg, Azelrod, Keenan, Kenzsiora, & Zins, 2007, p. 4). Students are expected to manage their own study and homework schedules, keep track of assignments and projects, and prepare for assessments with little, if any, guidance from teachers and staff. Ruiz (2012) discusses the transition into high school stating, “it is essential for teachers to set high expectations for all their

students and expect students to reach these standards” (p. 1). Benner (2011) connected these expectations to ninth graders’ lack of true understandings about school success stating, “More concretely, students may want to do well in school, but when faced with the choice of either doing their homework or hanging out with friends, they may opt for the option with the more immediate reward” (p. 303). High school students also are expected to know the classroom academic and behavioral norms, whether or not they have been explicitly taught or stated. Students face multiple pressures to perform, often in a public venue, at a time in their life when they are particularly sensitive to how they are being perceived by others (Manning, Bear, & Minke, 2006). This transition can disrupt already established social relationships and in a new social context, freshman may struggle with balancing social and academic expectations and behaviors.

Most of the prosocial behaviors that lead to academic and social success are implicit, that is, students are expected to discern from experience as a student or from watching those around them what the appropriate behaviors to engage in should be. Many students who enter the high school setting already identified as at-risk are at a disadvantage in the areas of academic and social skill development (Hammond, Linton, Smink, & Drew, 2007). These at-risk students can benefit from the assistance of a more experienced peer to provide them with explicit instruction and advising in academic and social skill development. Mentoring serves to promote social relationships and a sense of attachment to others that helps at-risk youth develop strong connectedness and development (Karcher, 2002). According to Karcher (2005a) the opportunity to receive support through peer mentoring relationships is an important factor in promoting positive outcomes for cross-age peer mentoring relationships. The activities that students choose to become involved in throughout their high school years lay the groundwork for other activities

promoting prosocial skills, social capital connections, and behaviors in the future (Reeves, 2008). Peer mentoring may provide a context that helps build skills, positive attitudes, and confidence in social interactions that may lead to increased social capital over time. Karcher's (2005a) research has indicated that for the more experienced individual, such as an older student who is a peer with a couple of years in age or grade level, the connections that mentoring provides increases involvement in building social capital. Finally, there are social behaviors expected and adhered to in the high school setting both as students and among peers in social and academic activities. An investigation of school-based peer-to-peer cross-age mentoring is important because high school students spend most of their time in in school, and mentoring in schools may provide a form of social support leading to high school success for both mentor and the mentee.

The theory of social learning provides understandings of how social skills are developed and internalized. Several key social learning theorists provide lenses in which to view the high school adolescent and social skill development. Additionally, these same social learning theories can be utilized to develop a framework for understanding school-based mentoring in the peer-to-peer context. There are four key theorists addressed for this purpose. Erik Erikson, Albert Bandura, Carol Gilligan, and James Coleman are social learning theorists who provide theories that relate to the development of the adolescent, social learning, social skill acquisition, and the development of social capital.

One of the theories that provides a framework through which to view school-based mentoring in relation to adolescents and the importance of social skill acquisition is that of Erik Erikson. Erikson (1968) described the impact of social experiences across the lifespan. Erikson's stages focused on developing competency and new learning, both of which are needed

for development. The psychosocial learning comes from the successful adaptation of the self, but this must be reaffirmed and nurtured continuously (Erikson, 1968). According to Erikson, positive social learning allows the adolescent to experience a sense of mastery. Furthermore, negative experiences cause the individual to emerge with a sense of inadequacy and poor self-esteem. Each of Erikson's stages allows for an opportunity for adolescents to be exposed to additional social learning skills and experiences.

Another of the theories that provides a framework through which to view school-based mentoring in relation to adolescents and the importance of social skill acquisition is that of James S. Coleman. Like Erik Erikson, James S. Coleman also believed in the importance of the social experiences for adolescents. Coleman (1988) described *social capital* as the resource that is created by investing in relationships with others through processes of reciprocal trust. Coleman further defined social capital as "any kind of social relationship that is a resource to the person" (Coleman 1990, p. 35). Coleman's theory (1988) claimed that positive, supportive relationships with parents represent a significant resource to developing adolescents. Coleman extended the concept of social capital when he asserted that it serves as a mechanism to transmit the effects of human capital from parents to children. Coleman (1988) theorized that parents possess social capital that they can invest in their children through the positive relationships and interactions that they have with their children. Additionally, the intellectual skills and career experiences that parents have, allow them to further create a cycle of human capital in adolescents. Such social capital can also be developed through other positive relationships. Strong bonds of trust and affection, which are directly related to social capital, are established when parents are active and involved in their children's lives. Mentoring can be an important element in creating self-esteem and guiding young people into developing into strong and successful adults. Coleman's theory

implies that positive parent relationships, along with mentoring relationships, allow for the creation of social capital (Coleman, 1988). In the situations where mentoring exists within the school setting and a parent is unavailable, not present, or lacking in skills, youth benefit when mentors provide necessary supports that are otherwise absent or weak.

A different social learning theory that provides a framework through which to view school-based mentoring in relation to adolescents and the importance of social skill acquisition is that of Albert Bandura. Albert Bandura's social learning theory focused upon the process of observational learning as the manner in which individuals learn how to function in society. Bandura (1977) stated that behavior is learned from the environment through the process of observational learning. Bandura's theory may explain how adolescents rely on mentorships to develop their ability to be motivated and create positive change in their life. His ideas can be applied to students who model the behaviors of those around them. Bandura's theory applies to the student mentor who engages in a leadership role and extends into a role of empathy, support, and encouragement. Many academic, classroom, and school related behaviors can be learned through modeling, imitation, and observation (Quigley, 2004). Upperclassmen in high school have previously experienced the transition from middle school to high school and may be able to provide prosocial skill and academic skill support, social engagement, and encouragement to incoming students. Peer mentors encourage, model, and teach students specific skills to assist them in becoming successful through inclusion in activities, observation, and imitation of appropriate social behaviors necessary for success in the high school system (Garringer & MacRae, 2008). The psycho-social theoretical frameworks of Erikson, Coleman, and Bandura were used to view and analyze this peer-to-peer mentoring program case study.

Purpose of the Study

The central purpose of this case study was to examine the experiences of high school peer mentors in a cross-age peer mentoring program in a rural high school setting in Oregon. The secondary purpose of the study was to identify issues related to mentoring matches related to age and gender. Student matches were based on four groupings: male to male, female to female, female (9th) to male (11th) and male (9th) to female (11th). Student contacts were monitored by staff during a specifically scheduled class time and extra-curricular school activities are supervised by staff to eliminate any potential risks to participants.

The study examined what aspect of relationship, school connectedness, self-esteem, and efficacy were influenced in mentors as they exercised their role in the peer mentoring relationship. *Peer mentoring* in this study referred to high school mentors who were mentoring other high school students in one-to-one relationships. The study examined mentoring relationships in which a more experienced high school student of junior standing mentored ninth grade students. The mentoring relationships focused on the prosocial skills needed by ninth graders to succeed in high school. The case study explored the personal reflections, experiences, and perspectives of the participants; in particular, those of the mentors in relationship to their school connectedness, thoughts about their personal self-esteem, and involvement in social capital were examined.

Research Questions

The case study was guided by two research questions from the perspective of the peer mentor.

- 1) To what extent does peer mentoring increase the peer mentors' prosocial skills of school involvement, school connection, and social capital?

- 2) Do mentors report identifiable differences between matches that are same gender or different gender, or differences between age differences and different gender? If so, what are the reported differences? If they do not, what are the reasons for the lack of reportable differences?

Sub-Questions

- a. What is the impact or effect of mentoring on the youth mentor?
- b. What effect does the quality of training of mentors prior to the mentorship match have on the mentoring relationship?
- c. Why is it important to support and provide ongoing training for peer mentors?

Rationale, Relevance, and Significance of the Study

Serving as peer mentors can be an important component in bolstering self-confidence, self-esteem and guiding youth towards developing into independent, healthy and successful adults. It assists youth in becoming self-sufficient, experiencing educational achievement, and attaining social/emotional well-being. Peer mentoring provides opportunities for adolescents who are transitioning into the high school to develop a sense of connection and capability by learning what mores are expected of the high school student. Seita and Brendtro (2005) indicated the importance of peer connections among adolescents. Seita and Brendtro explained that peer influence is a strong force in the lives of adolescents. Seita and Brendtro stated that peer bonding meets important social needs, in particular with adolescents who are vulnerable and struggling. Given that contact with members of their peer group is important during adolescence, peer relationships meet powerful social needs with at-risk youth who find themselves disconnected with family, school, and the community. The relationships established through peer mentoring provide an opportunity for students to be engaged in positive

relationships that increase the self-efficacy of students who have low social skills and low esteem when transitioning into the high school setting. Peer mentors engage in modeling and imitation that allows students to collaborate on joint decisions, express empathy, and deepen their perspectives (Krueger, 1992; Wentzel & Caldwell, 1997). Successful interaction and relationships with peers can facilitate the social skills and confidence of students including those of the peer mentors.

Moreover, researchers have identified that positive academic performance, including increased school attendance, and a more positive attitude has been attributed to connected mentoring relationships (Foster, 2001; Green, Mitchell, & Taylor, 2011; Karcher, 2009). Serving as a peer mentor is connected with increases in academic connectedness and self-esteem (Green et al., 2011; Karcher, 2009), academic engagement, (Crooks, Chiodo, Thomas, & Hughes, 2009) and empathy for others (Carter, Hughes, Copeland, & Breen, 2001). While the literature search executed for this study only found limited research regarding the impact of peer mentoring on the upper class peer mentor at the high school level when mentoring high school 9th grade peers, other research indicates that volunteering leads high school students to feel more connected and competent in regard to their school (Solomon, Watson, Delucchi, Schaps, & Battistich, 1988; Joselowsky, 2005, 2007). It is possible that the mentors themselves may experience these same reactions or feelings about peer mentoring relationships. High school students who feel better about themselves and their school will want to be at school and become involved in activities both in and out of the classroom (Deci, Vallerand, Pelletier, & Ryan 1991; McNeely, Nonnemaker, & Blum 2002; Schaps & Solomon, 2004).

One area of research that appears to be unaddressed in the literature is how peer mentors within the high school experience grow in esteem, connectedness, and confidence through

providing guidance and leadership to other less experienced peers. An additional area that appears unaddressed is the social growth and leadership that peer mentors engage in that may be related to increases in their own confidence, competency, and connectedness to their school. The investigations in this study sought to reveal the answers to these important questions.

Students involved in school-based mentoring programs increased their connections to their schools because they understand the roles and expectations at school and associate positive feelings with this connectedness (Karcher, 2005). According to Karcher (2005), connectedness raises the motivation for engaging in prosocial skills by students. The effects of connectedness are comparable to the positive effects of those reported by youth who engage in volunteerism (Snyder, Clary, & Stukas, 2000). Cross-aged tutoring or mentoring pairs a student with either higher grades or simply greater age or maturity with a younger student who may have a lower degree of academic success; this is often done for the purpose of academic tutoring and development of the younger student (Garringer & MacRae, 2008). While Garringer and MacRae (2008) stated that “some programs draw both mentors and mentees from the same school (for example, high school juniors mentoring incoming freshman)” (p. 3), they did not refer to specific studies or programs that had these mentoring configurations in order to establish this claim. The literature review for this study identified studies describing examples of cross-age peer mentoring between high school students and middle school or elementary school students, however, there were references to only a few studies that focused on the mentoring of the ninth grade student transitioning into the high school by an upper classman. Additionally, detailed studies identifying the use older high school students as mentors to ninth graders are unclear on the types or degrees of outcomes peer mentors might receive. Literature is available that outline the effects of mentoring on adult mentors. However, my review of the literature did not isolate

studies discussing the effects of mentoring on those engaging as a high school mentor with another high school peer. This study may add to the understanding of the effects on mentors as well as the benefits for both peer mentees and mentors.

Nature of the Study

In order to obtain information about the experiences of high school mentors as a result of their involvement with the peer mentoring program, a qualitative case study research design was selected. This research design was chosen because the investigation will examine constructed meaning within a bounded system of a specific group of individuals during a specific time frame (Yin, 2014). An exploratory case study research design was planned for addressing the research questions considered for this study because it could provide the most information about the perspectives of the participants as a result of their participation in the mentoring program. Peer mentoring relationships are specialized and involve the experiences of both the mentees and the mentor. There was a need to obtain information about the experiences of each mentor and identify if the experience of individuals promoted self-esteem, prosocial, and social capital skills. Interviews allowed the peer mentors to consider their activities and perceptions as peer mentors and consider their impact on the peers who they mentor.

As the primary researcher, I was the main instrument of data collection, recording, analyzing, and interpreting data. Data collection methods included surveys, interviews, documentation review, observation, and may include the collection of physical artifacts such as mentor notes of meetings with mentees.

Definition of Terms

At-risk students are defined as being at risk for “interpersonal problems and underachievement in the educational system, when their environments, abilities or behaviors

threaten to jeopardize developmental processes or academic success” (Karcher, Davis, & Powell, 2002, p. 35).

Mentoring is a form of human connection where one person invests time, energy, and personal expertise in assisting the growth and ability of another (Holmes, Hodgson, Simari, & Nishimura, 2010).

Mentors, for the purpose of this study, are the high school juniors occupying the role of the facilitators of growth and ability of another.

Mentees, for the purpose of this study, are the high school freshman occupying the role of the less experienced student in need of guidance.

Peer-to-Peer Mentoring is the high school mentoring program in which freshmen are the mentees and juniors are the mentors.

Positive psychosocial development outcomes include an improved self-esteem, increased sense of social and personal competency, and school connectedness (Karcher, 2009).

Positive outcomes in terms of behaviors refers to decreases in risk behaviors such as trying or engaging in drug and alcohol use, sexual experimentation and poor peer group interactions (Jekielek, Moore, & Hair, 2002).

Positive outcomes, of those who have been mentored, refer to increases in academic performance including improvements in homework turn-in, classroom participation, and formative and summative assessments (Jekielek, Moore, & Hair, 2002).

Prosocial skills are “a set of competencies and behaviors that a) allow an individual to initiate and maintain positive social relationships, b) contribute to peer acceptance and to a satisfactory school adjustment, and c) allow an individual to cope effectively with the larger social environment” (Walker & Holmes, 1987, p. 27).

School connectedness is “when a person is actively involved with another person, object, group, or environment, and that involvement promotes a sense of comfort, well-being, and anxiety reduction” (Townsend & McWhirter, 2011, p. 193). For the adolescent, school connectedness is characterized by “being close to people” and “feeling a part of” the school environment, contexts, and relationships (Resnick, Bearman, Blum, Bauman, Harris, & Jones, 1997, p. 825).

Self-efficacy is defined as the belief in one’s ability to create certain outcomes (Bandura, 1977).

Social capital is “any kind of social relationship that is a resource to the person” (Coleman 1990, 35). It is created by developing relationships with others through facilitating trust and reciprocity within the relationship (Coleman, 1988).

Assumptions and Limitations

It was expected that peer mentoring would increase the peer mentors’ reported prosocial skills, as reported and described through the surveys and interviews. These increases were related to school involvement, school connection, and social capital as measured by the Hemingway Connectedness Survey-Short Version. It was anticipated that the act of cultivating a relationship with a younger student and the process of developing a relationship and engaging in the mentoring activating would build social capital, self-esteem, and efficacy in the mentor as measured by the Hemingway Connectedness Survey Short Version. The details of these expectations are discussed in Chapter 2 of this document.

The present study has a number of factors that are potential limitations. The study had a small sample (7 mentees and 7 mentors) and short duration (a single academic semester). A study with a larger set of participants and a longer time span for data collection, with several

program cycles of mentors and mentees, could provide a more robust base of data from which to better understand the research problem. Additionally, participants in the present study may have reported more positive responses than they actual felt or experienced. As the students became more involved in the program, they expressed more positive results, perceptions, and feelings about the mentoring program even when particular activities were challenging or mentees appeared unengaged or uncooperative. It may be that mentors felt that by reporting notable results, whether or not these were perceptions they actually held, would reflect more positively on them as a group or individually. Another limitation may have been in the quality of the relationships. Mentoring relationships require time to cultivate (Clutterbuck & Lane, 2005). Given that this study was relatively short, there may have been a perceived or actual conflict between participants since they were still early in establishing their relationships.

Chapter 1 Summary

This chapter provided an introduction to the problem. It discusses the transition of freshman student into the high school setting and the role that junior level high school student can play in providing mentoring to aid in a successful transition to the high school setting. Cross-age peer mentoring was discussed as a potential format in delivering mentoring to youth.

The background, history and conceptual framework for the problem was discussed in this chapter to provide context to the study. The central purpose of this case study is to examine the experiences of high school peer mentors in a cross-age mentoring program in a rural high school setting in Oregon. The study examined what aspects of peer mentoring relationships, school connectedness, and the development of social capital occurred in mentors who were participants in this case study. Research questions of interest to the me in this case study include the impact of mentoring on the youth mentor, the quality of training of mentor prior to the mentorship

match, the support and ongoing training for mentors in the high school setting. The rationale for exploring this particular research was discussed in terms of the potential importance that peer mentoring may be for peer mentors in building prosocial skills, school connectedness, and social capital.

Chapter 2: Literature Review

Introduction to the Literature Review

Historical Foundations of Mentoring

Mentoring has been found in virtually every culture as a means through which humans engage in relationships of support and help with other humans. Stories can be found of various mentorships throughout historical literature. One such story is that found in Homer's *The Odyssey*, in which Odysseus charges Mentor, his oldest friend, with the task of caring for his household. While Odysseus is away at war, Mentor serves as a teacher and guide to Odysseus' son, Telemachus. Mentor supports and helps Telemachus as a de facto parent and advisor.

History offers other examples of mentoring relationships: Socrates and Plato, Naomi and Ruth, Hayden and Beethoven, Freud and Jung, and Anne Sullivan and Helen Keller. Mentoring is a form of human connection where one person invests time, energy, and personal expertise in assisting the growth and ability of another. "Mentoring requires dedication to the process, which includes substantial investments of time, energy, and resources—physical, emotional and intellectual" (Holmes, Hodgson, Simari, & Nishimura, 2010, p. 336). Through their time and work, mentors help move mentees towards competency, self-efficacy, and social growth.

There is no single archetypal mentor. Many kinds of mentors can be seen in the news, on television, and throughout everyday life. For example, many celebrities have mentored young people or have used their power, fame, and finances to encourage and mentor others during times of trouble or tragedy. There are countless ordinary individuals who have served as an example to one or two people—a retiree who works with a homeless adolescent rebuilding his self-esteem and confidence or a restaurant manager who provides skill and opportunities to others in the store. In each case, mentors have worked with others to teach skills, build confidence and pass

on knowledge. Mentors seek to facilitate the learning and growth of a mentee, while the mentee seeks the experience and encouragement of the mentor to assist in his or her growth and skill development. Merriam, Caffarella, and Baumgartner (2007) stated that, “The mentor serves as guide, cheerleader, challenger, and supporter during the learning process” (p. 138). Mentoring relationships are similar to friendships in that they emphasize personal interactions. The difference, however, is that a mentorship’s direct emphasis on personal or professional growth is something not required within a friendship.

Formal mentoring programs in the United States date back to the late 19th century and were developed to counter the risks individuals faced in their daily lives (Freedman, 2008). The Friendly Visiting Campaign recruited hundreds of upper middle class women to work with poor and immigrant communities in order to assist them in developing vocational and cultural training skills for every day functioning (Freedman, 2008). Today, one of the oldest and largest programs of mentoring is the Big Brothers Big Sisters, which originated in New York City at the beginning of the 20th century as separate organizations, providing mentoring for disadvantaged boys and girls who had been involved in the city’s children’s court. In 1997, the two groups joined and have a common goal of connecting middle class adults with at-risk, disadvantaged youths to provide them with socialization, guidance, and positive role models. The Big Brothers Big Sisters mentoring program model has been utilized to establish various mentoring program throughout the United States due to its success with youth.

As the largest youth mentoring program in the United States, Big Brothers Big Sisters of America have a network of over 375 agencies across the country and serve more than 210,000 children (Blakeslee & Keller, 2012). Big Brother Big Sisters also involve youth mentoring other youth. The Big Brother Big Sisters do have mentoring that target schools that “serve students

who are economically disadvantaged or have special academic needs” (Herrera, Grossman, Kauh, Feldman, & McMaken, 2007, p. 24). By partnering with target schools, Big Brothers Big Sisters can access large groups of young people who may be able to benefit from the program. The volunteer mentors in the Big Brother Big Sisters program are referred to as “Bigs.” In a recent study of school based mentoring Big Brother Big Sister programs, half of the Bigs were 18 years old or younger, and an additional 17% were 19 to 24 years old. Over 66% of the mentors were enrolled in either high school or college (Herrera, et al., 2007). However, the majority of students who were mentored were in elementary school (Herrera, et al., 2007). The results of this study provide evidence of positive outcomes for both mentors and mentees in school based partnerships. The success of the Big Brother Big Sisters programs highlights the positive impact tht mentoring can have for youth.

In the United States today, many mentoring programs concentrate on specific segments of high risk populations including abused and neglected youth, youth with disabilities, pregnant and parenting adolescents, at-risk youth (Keating, Tomishima, Foster, & Alessandri, 2002), children of prisoners (Goode & Smith, 2005), and adolescents in the juvenile justice system (Britner, Balcaza, Blechman, Blinn-Pike, & Larose, 2006). Many school, juvenile justice and department of human services mentoring programs are supported by federal, state, local and private funding sources. With the support of foundations and corporations such as Fannie Mae, Commonwealth Fund, United Way of America, Chrysler, Procter and Gamble, and the National Urban League, the contemporary youth mentoring movement was established in the late 1980s (Fernandes-Alcantara, 2012). The federal government also began supporting structured mentoring program and initiatives at this time. “At that time, mentoring was becoming increasingly recognized by the government as a promising strategy to enrich the lives of youth,

address the isolation of youth from adult contact, and provide one-to-one support for the most vulnerable youth” (Fernandes-Alcantara, 2012, p. 4). With government support, structured mentoring programs had the ability to establish themselves throughout the country.

More recently, federal legislation has provided ongoing, stable funding for mentoring programs since 2001 including: (a) The Mentoring Initiative for System-Involved Youth for youth in foster care and juvenile justice systems; (b) The Safe and Drug-Free Schools Mentoring program for youth at-risk of educational failure, dropping out of school, or involvement in delinquent activities; and, (c) The Mentoring Children of Prisoners Program for children of incarcerated parents to provide social, emotional, and academic support (Fernandes, 2008). Private mentoring programs are established in schools, through community organizations, and by church organizations throughout the nation and secure funding through grants, donations, and private individuals (Dubois, Portillo, Rhodes, Silverthorn, & Valentine, 2011).

Based on these historical foundation descriptions and claims, it is reasonable to conclude that mentoring may provide a significant form of social support to adolescents in high school. This conclusion led me to think that an investigation of school-based mentoring literature would be important given that adolescents spend most of their time in school and mentoring in schools may provide a form of social support leading to high school success.

Conceptual Framework

A conceptual theory that draws on both cognitive and behavior influences relevant to mentoring is that of social learning theory. Learning occurs through social interactions and influences from those with whom one comes in contact. Through social interactions learning occurs and meaning is constructed from these interactions (Vygotsky, 1978). There are numerous opportunities for adolescents to enhance their social learning through their interactions

with peers. Peer mentoring relationships is one way in which to enhance the social learning in school. Social learning theories are based on the idea that people learn indirectly by observing and modeling the behaviors with whom the person identifies (Bandura, 1977). In school-based peer mentoring, peers observe their peers behaving in specific ways and seek to emulate these peers. Peer support is a crucial part of the learning process for adolescents, especially through modeling (Bowers-Campbell, 2008). Modeling, along with other social interaction, creates an opportunity for adolescents to engage in active learning. “Social activities allow students to express and develop their understandings with peers as they pursue projects through conversations that stimulate examining and expanding their understandings” (Sherman & Kurshan, 2005, p. 12). Through peer-to-peer mentoring, social learning theory is evident as the ongoing assimilation of skills and confidence is built. This allows individuals to engage in new behaviors independently with success.

Psychosocial Theoretical Frameworks

Erikson. The social learning theory of Erik Erikson is one framework through which to view school-based mentoring in relation to adolescents and the importance of social skill acquisition. Erikson described the impact of social experiences across the lifespan. In Erikson’s (1968) psychosocial learning theory, he explained that the development of the ego identity through a progression of stages that an individual progresses through. The development of the ego identity is the sense of self that is developed through social interactions and is constantly changing, according to Erikson, through new experiences, interactions and information that is acquired. The formation of this ego identity is particularly important during adolescence and provides the adolescent with a cohesive sense of self that will allow the individual to progress through each stage and achieve the final stage of development. The description of Erikson’s

stages focused on developing competency and new learning both which are needed for development. The psychosocial learning comes from the successful adaptation of the ego but this must be reaffirmed and nurtured continuously (Erikson, 1968). Adolescents who engage in positive social learning experience a sense of proficiency in their skills. Negative experiences cause the individual to emerge with a sense of inadequacy. For each stage, there is an opportunity for adolescents to be exposed to additional social learning activities.

From this perspective, peer mentors provide direction and guidance surrounding expectations of the roles of a student and prosocial functioning of an adolescent. Targeted skill development can occur in a supportive and encouraging manner through peer-to-peer interactions. As a result, adolescents absorb these norms and engage in practicing positive prosocial behaviors and activities. For Erikson's social learning theory to be applied appropriately to a mentoring relationship, it is ideal for the mentoring relationship to exist beyond a year in length. Studies have shown that the positive effects on youth outcomes became progressively stronger as relationships lasted for longer periods of time and were greatest when relationships were maintained for at least one year (Grossman, Chan, Schwarts, & Rhodes, 2012; Grossman & Rhodes, 2002; Rhodes, 2001; Sparks, 2010). This type of extended period provides the time for the movement through the stages of industry and ego identity formation and provides evidence of the adolescent engaging in the application of social skills required for mastery of these stages.

Coleman. While James Coleman did not necessarily build on Erikson's theories, like Erikson, he did ascribe to the importance of sustained relationships and connections within social groups. The foundation to Coleman's theory (1988) was that strong sustained relationships with parents represent a critical resource for developing adolescents. Coleman (1988) described

social capital as the value that is created by generating relationships with others engaging in processes of trust and reciprocity.

The foundation of social capital occurs when parents are positively involved in adolescent's lives responding in a reciprocal relationship with trust and affection. Coleman asserted that social capital as a process serves as a mechanism to transmit the effects of human capital from parents to children. Coleman (1988) theorized that parents have human capital that they can invest in their children through positive interactions. Additionally, the cognitive skills and employment experience that parents have allows them to further invest in adolescents creating a cycle of human capital. Mentoring can be an important component in promoting self-esteem and helping youth develop into independent and successful adults. The cornerstone of Coleman's theory is that the positive parent relationships, along with mentoring relationships, allow for "closure of the social structure . . . permits the existence of effective norms and also for another form of social capital: the trustworthiness of social structures that allow the proliferation of obligations and expectations" (Coleman, 1988, p. 107). In the situations where mentoring exists within the school setting and a parent is not available, is not present, or is lacking in skills, youth benefit because mentors provide necessary supports that are otherwise absent or weak.

Other researchers have built upon Coleman, finding that mentoring does not occur in isolation. "Parents, teachers, mentors, and other services providers . . . are all important agents in helping to develop youth. Each needs to understand and practice methods for support the development of healthy identities" (Ferguson & Snipes, 1994, p.22). Research shows that "supportive older adults...can lead to positive outcomes among youth living in high-risk circumstances" (Rhodes, Reddy, Rofman, & Grossman, 2005, p. 147). Both Erikson and Coleman believed that social learning allows for mentoring to contribute to creating a legacy of social capital

skills that one person passes on to the next. Mentoring assists youth in becoming self-sufficient, experiencing educational achievement and attaining social/emotional well-being. Future generational outcomes happen not only at school, but within an “ecosystem of learning in the home, at the computer, on athletic fields and in community clubs, churches, museums theaters, and a variety of other places” (McCluskey & Treffinger, 1998, p. 86). Mentoring allows the facilitation of social learning that is carried over into many of these experiences. While both Erikson and Coleman supported social learning, their theories extend across the lifespan and did not seem to fully address the short term assimilation of social behaviors that allow an individual’s overall success and achievement in the educational setting.

Bandura. Albert Bandura’s (1977) Social Learning Theory focuses on the internalization of modeled social behaviors and explains the mentoring relationship. According to Bandura’s, the mentor is the *model* and the mentee is the *observer*. Bandura claims that the highest level of observational learning happens when the observer, or mentee in this case, practices the social behavior symbolically, and then reenacts it in other situations (Bandura, 1977). In Bandura’s framework the observer, or mentee, is more likely to adopt and imitate the modeled behavior if they are similar to the model, in this case, the mentor. This theory may help influence the implementation of mentoring programs, pairing of mentors to mentees, and how the mentoring relationships should be developed.

Bandura defined mentoring as “exposure to actual or symbolic models who exhibit useful skills and strategies that raise the observer’s beliefs in their own capabilities” (Bandura, 1997, p. 93). Peer mentoring provides a vehicle in which youth transitioning into the high school setting can develop a sense of belonging and competency by internalizing the values and norms that are socially expected of the high school student. Given that peer influence is especially

strong in adolescence, peer bonding meets important social needs, in particular with vulnerable adolescents who find themselves disconnected with family, peers and school (Seita & Brendttrø, 2005). According to Quigley (2004), young people who are considered high risk will naturally seek those with whom they can relate, especially if they feel wanted by a person or a group. Upperclassmen are in the unique position of having experienced the transition and can provide support and encouragement to incoming students. Bandura's ideas can be applied to students who model the behaviors of those around them. Students who are struggling with behavior or social skills can learn behavioral skills by watching and imitating other people they admire. A wide variety of classroom and school related behaviors can be facilitated, strengthened, learned through modeling, imitation, and observation (Quigley, 2004). Peer mentors encourage, model, and teach students specific skills to assist them in becoming successful through inclusion in activities, observation, and imitation of appropriate social behaviors necessary for success in the high school system.

Bandura (1977) believed self-efficacy determines one's behavior and well-being. Self-efficacy refers to the personal belief in one's own ability to organize and manage a successful course of action. Bandura's (1977) explained self-efficacy as the personal belief in one's ability to plan and create specific outcomes. The ability to cope with or overcome adverse situations determines the extent in which to make an effort to do so. Individuals determine how much personal commitment to invest, effort to expend, and how long to remain persistent (Bandura, 1977). Many individuals cite self-efficacy as directly correlated to positive experiences within mentoring relationships (Parra, DuBois, Neville, Pugh-Lilly, & Povinelli, 2002). Peer mentoring provides an opportunity for students to be engaged in positive relationships that increase the self-efficacy of students who have low social skills and low esteem when transitioning into the high

school setting. Modeling and imitation allows for students to engage in collaborative decisions, express empathy, and deepen their perspectives (Krueger, 1992; Wentzel & Caldwell, 1997). Successful interaction and relationships with peers can facilitate the social skills and confidence of students including those of the peer mentor (Garringer & MacRae, 2008). These can contribute to building “knowledge bases that help them [students] navigate social situations” (Tate, 2006, p. 215). Bandura’s theory may explain how adolescents rely on mentorships to develop their ability to become motivated and create positive growth in their life.

Bandura’s Social Learning Theory is based on the idea that people construct a reality similar to what they see around them. Additionally, this reality becomes reinforced by what an individual observes of those around him or her who are most similar to him or her (Copple & Bredekamp, 2009). This theory of social learning implies that if an adolescent lives in a family of poverty, for example, where no one has graduated from high school and a limited work ethic is observed, then this behavior will be imitated. However, it also allows for the different opportunities and experiences that individuals may become exposed to as they construct this reality. The thought of contributing to others and improving one’s situation or environment is not directly considered by Bandura despite his reference to self-efficacy.

Bandura’s ideas can easily be applied to students who model the behaviors of those around them involved in mentoring programs. Many students involved in mentoring programs are first generation high school or college graduates breaking cycles of low academic achievement, poverty, and low motivation. Adults such as teachers, mentors and coaches who have encouraged, modeled, and taught students specific skills to assist them in becoming successful allow students the opportunity to observe and imitate appropriate social behaviors in the educational system necessary for success and acceptance. Bandura (1977) refers to this

concept as modelling. When mentees interact with mentors, they are socialized and as a result, adopt what has been observed from the mentor. Additionally, this theory applies to the student mentor who is engaging in a leadership role and extending him/herself into a role of empathy, support, and encouragement.

Gilligan. While Carol Gilligan has criticized Erikson's stages specifically regarding adolescent identity formation, she may have important contributions around the development of relationships and social capital. Erikson's stages, she claimed, largely ignore the importance of relationship and shows "the interference of human life and reliance of people on one another... [is] largely unrepresented" (1987, p. 68). Gilligan also suggested that Erikson does not place enough emphasis on the female in his stages of identity formation. Erikson did not believe that there were significant differences between males and females in adolescent development so did not address differences such a male and female gender role development. Gilligan noted female identity is integrated in the cultural norms and in establishing close intimate relationships. The gender differences in identity formation are keys to her argument against Erikson's; however, they do not negate the idea of the social learning that takes place in the stage of Erikson's theory that corresponds with adolescence. In fact, these gender differences in identity formation provide an area in which to expand Erikson's ideas and an arena in which to highlight the psychosocial aspects of social learning for adolescents as they develop their identities and fulfill their roles. A majority of Gilligan's work is centered on the development of caring behaviors among peers.

Review of Research Literature and Methodological Literature

Common Forms of Mentoring

Issues of accessibility and support for vulnerable populations have created a need for mentoring programs where youth are during the majority of their time. While many youth are involved in site based activities, high school youth are not typically involved in afterschool programs outside of their home school of attendance (Lauver, Akiba, Wilkerson, Apthorp, Snow, and Martin-Glen, 2006). This explains the reason why, to date, 70% of site-based mentoring programs are school-based (Karcher, Kupermire, Portwood, Sipe, & Taylor, 2006). Schools provide the convenience and environment for mentors and mentees to develop and sustain relationships in a protected and structured setting for both the mentors and mentees. They also provide a perfect context for developmental mentoring because of the availability of volunteer mentors, the availability of a regular place to meet, and the opportunity for school personnel to assist in providing a structure the mentoring (Karcher, et al., 2002a). In my experience, a school's mentoring program provides a setting for training of mentors and mentees, ongoing support structures, and a location for overall supervision and implementation of the mentorship.

School-based mentoring programs assume a variety of formats. One-to-one mentoring programs typically consist of an adult mentor matched to a youth. In one-to-one mentoring relationships, an older, more experienced person voluntarily gives time to teach, support, and encourage a younger person (Courtney, 2000). Traditionally, this has been one of the most common mentoring matches investigated by researchers in school-based mentorships (Herrera, 1999). In my investigation, school-based one-to-one mentorships has been clearly identified as the most common. However, because studies and research surrounding other forms of mentoring appear to be limited, it is difficult to know for certain if this form of mentoring is, in fact, the

most common. Additionally, there is limited research regarding national and state statistics on peer mentor and peer mentee involvement in mentoring programs at the high school level between ninth grade students and upperclassmen.

School-based mentoring occurs at the school site and either during or after school hours and includes activities such as tutoring, playing sports, or engaging in other activities or games (Herrera, 2004). School-based mentoring also can include job shadowing and college and career exploration. Online mentoring occurs over the Internet. This form of mentoring allows relationships to be developed through exchanging online communications. This can allow youth to develop technology skills, connect with a mentor around a potential careers or special project (Sinclair, 2013). Group mentoring relationships are where more than one young person is matched with one or more mentors. Here the mentor/s and mentee engage in a variety of activities including tutoring, career exploration, life skill development, sports, games, and other forms of entertainment (Jekielek, Moore, & Hair, 2002).

Included in the research about one-to-one school-based mentorships were the following primary elements: time to develop meaningful connection, frequency of contact, continuity and longevity (de Anda 2001; Dubois, Holloway, Valentine, and Cooper, 2002, Grossman & Rhodes, 2002; Schultz, 1999). It has been found that one-to-one mentorships are generally only successful when reasonable efforts are made to match mentors and mentee after the consideration of social and cultural contexts (Salinas & Reyes, 2004; Guetzloe, 1997). One-to-one mentoring works best when matches meet for at least four hours a month and relationships remain intact for at least one year (Grossman et al., 2012). Youth mentoring programs face the demand of establishing mentoring matches that will last long enough for the youth to gain benefits that quality relationships with mentors can produce. Grossman and Rhodes (2002)

indicated that youth may benefit most from matches that are at least one year in length, however, most school-based mentoring programs generally result in relatively short matches, culminating at the end of the school year. I have found that it is often difficult to recruit volunteers to commit beyond the regular school year, and students are involved in other activities during the summer and find it difficult to maintain contact with their mentors. The benefits of this type of mentoring program do not appear to persist beyond the school year (Aseltine, Dupre, & Lamlein, 2000). The research does not seem to specifically address the duration or quality of high school mentorships, instead grouping all school-based mentorships within one category. While this study was less than a year, the mentorships in this study are designed to last for two years.

Online mentoring is a form of school-based mentoring typically used at the college level that occurs online between mentor and mentee in the form of email, instant messaging, audio, video conferencing, and online discussion boards. While online mentoring exists as a form of mentoring, it typically is not used at the high school level for various reasons. First, it is difficult to recruit and maintain strong volunteers into a program that they have not grown up with (O'Neill, 2001). As comfort with technology increases, it is likely that the ability to recruit strong volunteers into online mentoring will also increase. As more adults are familiar with technology such as email and chat rooms, this may change and competent volunteers may be more available to engage in this form of mentoring (Woodward, Freddolino, & Wishart, 2013).

At this time more traditional forms of volunteerism and mentoring are easier to execute by schools because they are more familiar to current volunteer pools and prospective mentors. Volunteers must overcome the uncertainty of how online mentoring looks and works (O'Neill, 2001). There are a variety of organizations that sponsor online mentoring programs. However, these are associated with a cost. Schools may or may not have a budget for to participate in this.

As part of designing online peer mentoring, schools must consider if they have the technology or the structure to monitor and provide support and training for mentors and mentees to supervise an online-mentoring program (O’Neil, Gomez, & Louis, 1996; Stepanek, Gates, & Parsley, 2013). Sinclair (2013) defined mentoring, also, as a “nurturing process” (p. 79) where mentoring functions are carried out within the context of an ongoing, caring relationship between mentor and mentee. Based on Sinclair’s definition, this type of relationship is difficult to develop with the at-risk adolescent in the online environment. At-risk adolescents often require face-to-face interactions for positive relationship building. Beneficial effects are expected only to the extent that the mentor and youth create a strong connection and relationship that is characterized by mutuality, trust, and empathy (Spencer, 2007). For such a bond to develop, mentors and mentees are likely to need to spend time together on a consistent basis over some significant period of time (Spencer, 2007). Additionally, this form of mentoring is not generally viable for the at-risk student due to economic barriers related to accessing computers or other forms of technology. Specifically, for high school students, there are many barriers associated with student access to the required technology or knowing how to use it, issues associated with isolation and failure to log in regularly to communicate online often exist (Muilenburg & Berge, 2005). Panitz (1999) reported “technology can never replace the affective nature of education created by face-to-face interaction between students and between students and teachers” (p. 1). Studies have reported positive outcomes with online mentoring, such as immediate feedback and flexibility of timing and increased opportunities for interaction (Cravens, 2003; Ensher, Heun, & Blanchard, 2003; O’Dwyer, Carey, & Kleiman, 2007; Ku, Akarasriworn, Glassmeyer, Mendoza, & Rice, A. 2011). However, for at-risk students, there are problems associated with access to technology, knowing how to use the technology, lack of motivation, failure to use the discussion

boards, and further isolation from others (Corderoy & Lefore, 1997; Hart & Gilding, 1997, Ku, et al. 2007).

In terms of studies of online mentorships at the high school level, there is a lack of research at the high school level and an absence of investigation into online mentorships with mentors and mentees who are considered at-risk high school students. What is known is for the at-risk high school student is the need for face-to-face meetings both due to the desire for face-to-face interactions as well as for effective mentoring (Phelan, Davidson, Locke, & Thanh, 1992). “At-risk students encounter more troubles outside of school and are more easily distracted from their schoolwork. As a result, they desire more face-to-face contact” (Phelan, et al., 1992). The benefit of face-to-face mentoring is that it allows participants to build authentic connections, learn each other’s personalities, and create personal meanings.

Group mentoring programs can be found in both school-based and community based mentoring programs. Common community based programs are found in the form of scouts, 4-H, Boys and Girls Clubs and other similar skills-training, team sports, and outdoor adventure programs where one or more adults meet with young people in specific time slots on a regular basis. Group mentoring where one or more adults or experts engage with mentees, also is found in the college setting, businesses, and elementary and middle schools. In group mentoring, the group generally has a common purpose or mission (Rhodes, 2002). While there appears to be little reported in the literature regarding group mentorships specific to school-based setting and high school students, group mentoring may be particularly helpful to adolescents in the promotion of positive social interactions (Bandy & Moore, 2010; Herrera, Vang, & Gale, 2002). Youth and mentors report, in the literature, that youth improve their ability to work with peers (Karcher, 2007). “Some youth become less shy and inhibited, improve their conversation skills,

become more considerate or showed improved in their ability to manage anger and conflict. Both mentors and peers appear to play a role in bringing about these changes” (Herrera et al., 2002, p. v). Group mentoring may have the following limitations: lack of single personal one-to-one relationship, keeping costs low for activities, behavioral problems of mentees affecting others, and difficulty ensuring all mentees receive equitable time and attention (Herrera et al., 2002).

Similar research conducted by Eby (1997) expanded on the idea of group mentoring and included interteam, intrateam, and professional association mentoring. This team mentoring occurs when teams of individuals work together to help other individuals develop their capacity within or across teams. Professional association group mentoring occurs when a professional association mentors a mentee through various methods such as building social and business networking (Dansky, 1996). The team mentoring form of group mentoring is exclusive because the mentoring “emerges from the dynamics of the group as a whole, rather than the relationships with any one person” (Dansky, 1996, p. 7). Team mentoring appears in school-based settings most commonly at the college level, but can be seen in the high school level and can be present in professional academic groups such as National Honor Societies, National Forensic League, and others. Literature surrounding team mentoring at the high school level appears to be limited to specific clubs or groups designated towards average to above average students’ growth of academic skills and college-bound potential.

School-based Mentoring

Research surrounding school-based mentoring (SBM) indicates positive outcomes across three academic and behavioral areas: academics, risk behaviors, and psychosocial development (Jekielek, et al., 2002). For the purpose of this discussion, *positive outcomes, of those who have*

been mentored, as mentioned prior, refers to increases in academic performance including improvements in students' homework turn-in, classroom participation, and formative and summative assessments. Additionally, positive outcomes will show increases in psychosocial development outcomes include an improved self-esteem, increased sense of social and personal competency, and school connectedness. *School connectedness* has been defined throughout the literature in a variety of ways. For the adolescent, school connectedness is described as “being close to people” and “feeling a part of” the school atmosphere and social contexts (Resnick, et al., 1997, p. 825).

A variety of studies have been designed to focus on the impact of behavioral and social outcomes for students in 6th through 12th grades who are involved in school-based mentoring programs. According to most of the research surrounding the purpose of mentoring, the main interventions for the mentees revolve around the idea of improving self-esteem and social skills (Green, Mitchell, & Taylor, 2011, p. 116). Studies have identified that positive academic performance including increased school attendance and a more positive attitude has been attributed to positive mentoring relationships (Green et al., 2011; Karcher, 2009). The research indicates that peer mentor relationships lead younger students to feel more competent about their place at school. High school students who feel better about themselves and their school; will want to be at school and become involved in activities both in and out of the classroom (Deci, et al., 1991; McNeely, Nonnemaker, & Blum 2002; Schaps, Battistich, & Solomon, 2004). Students who are at school more regularly engage in the habits, routines and expected behaviors that incorporate into their school identity (Blum, 2005; Goodenow & Grady, 1993; Noddings, 1996).

Psychosocial Outcomes

While academic achievement is often the goal of a school-based mentoring program, the psychosocial outcomes related to mentoring appear to be the primary benefits for students who participate in school-based mentoring programs (King et al., 2002; Portwood Ayer, Waris, & Wise, 2005). Gordon, Downey, and Bangert (2013) explain that school-based mentoring programs “reduce the number of students’ discipline infractions as well as improve students’ attendance, self-confidence, engagement in academics and a sense of connectedness” (p. 234). The process of assimilation of the expected social classroom behaviors, which occurs through mentoring, leads to feelings of competency and increased self-esteem. These ideas are supported throughout the literature. When students receive peer supports such as esteem enhancement, cognitive appraisal and emotional support (Munsch & Blyth, 1993), they develop a sense of school connectedness (Gordon, et al., 2013; King, Vidourck, David, & McClellan, 2002; Portwood, et al., 2005)

If students who are at-risk develop a sense of school connectedness, resolving issues of attendance and lack of student motivation, the development of self-confidence and competency may be modeled, which can lead to social growth (Rhodes, 2002; Schaps et al., 2004). This social growth encourages students to engage in more socially appropriate behaviors necessary for classroom success and later, academic achievement. One question that appears to be unaddressed in the literature is how peer mentors within the high school experience grow in esteem, connectedness, and confidence through providing guidance and leadership to other less experienced peers. Additionally, students who are mentoring others may also be developing a sense of social growth and leadership, thus increasing their own confidence, competency, and connectedness to their school.

Gordon et al. (2013) countered the information outlining the positive effects of participation in school-based mentoring programs on students' academic performance and prosocial peer relationships by citing evidence found in a variety of studies (Dappen & Isernhagen, 2006; Herrera, 1999, 2004; Matinek, Schilling, & Johnson, 2001; Portwood et al., 2005). Some researchers cited inconclusive results regarding the impact of school-based mentoring programs. It is important to consider inconclusive results or contrasting evidence when exploring this topic and seek to address concerns or questions that have remained unanswered. A main reason for inconclusive results is directly related to the limited ability to provide youth with a mentor for an extended period of time in school-based mentoring programs. For example, school-based mentorships generally last a school year and may or may not continue into the next school year. Such a mentorship lasting a limited duration is related to little significant improvement in mentees' academic, social, and substance use outcomes (Jekeilek, Moore, Hair, & Scarupa, 2002). The lack of commitment or follow-through by a mentor can be damaging to the at-risk adolescent (Karcher, 2006; Rhodes, 2002). Downey and Feldman (1996) reported that if adolescents have identified with their mentor and have developed a relationship and connection to their mentor "feelings of rejection and disappointment . . . can lead to a host of negative emotional, behavioral and academic outcomes" (p. 59) if the mentorship ends prematurely. Future research and training focused on the support of mentors and the prevention of premature mentorship termination will assist in shoring up mentorship programs focusing on adolescents. Rhodes (2002) identified ways to avoid limitations of mentorships in order to make consistent positive impacts on students. These include focusing on the strong advantages of school-based mentorship programs: increased supervision and training available for mentors and mentees, increased safety for mentors and mentees, increased numbers of volunteers available,

increased focus on direct student needs, and increased opportunities to reach high-risk youth and families (Rhodes, 2002).

Academic achievement is intertwined with the psychosocial development of young people; thus the implication is that, in order for students to achieve academically, they must develop social competence in the classroom (Rhodes, Spencer, Keller, Liang, & Noam, 2006). Mentoring relationships lead to classroom social competence by reducing disciplinary action, improving attendance, self-confidence and engagement, as well as a sense of connectedness (Gordon et al., 2013). Two variables that provides a buffer against stress and contribute to adjustment and development are social identity and support networks (Clark, 1991). Students who are less stressed are better able to adapt to the school environment. Cross-age peer mentoring assists youth in establishing and maintaining healthy relationships, expressing feelings and emotions, and developing self-esteem (Williams, 2011). Feeling socially supported in one's school environment seems to encompass a large part of building academic resilience and encouraging positive educational outcomes for not only at-risk students, but all students.

There are a variety of studies found in the academic literature supporting the value of mentor programs. Mentoring, in its various forms, has proven to be effective with many different types of youth, including youth considered at-risk (Davidson & Redner, 1998; Karcher, 2005; McLearn, Colasanto, Schoen, & Shapiro, 1998). A primary purpose of mentoring, as described in the research, is that it is often utilized as an intervention for students classified as at-risk. The process of mentoring is intended to strengthen individuals who are considered at-risk by providing a personal connection with a mentor who is connected to at-risk youth and by establishing a personal relationship. Throughout the literature, the term *at-risk* has various definitions and applications in education, but is commonly associated with youth who do not

master the basic academic, vocational, social, and behavioral skills required to function successfully in school, in the workplace, and in the community and “who lack the support to navigate developmental tasks successfully” (Keating et al., 2002, p. 1).

In the school environment, mentoring assumes the form of a supportive relationship between a mentor and a mentee that is based on trust, communication, and shared understandings and behaviors key to being a successful student (Freedman, 2008). This trust and communication is based on the sharing of personal identities and stories as well the mentor providing guidance, direction, and explicit instruction in the acquisition of social roles. The mentor provides guidance and support for the mentee to develop their fullest potential based on a vision for the future. Student-to-student cross-age peer mentoring programs promote the psychosocial development of both adolescent mentors and mentees by developing social skills, experiences, and interpersonal support that promotes self-esteem and connectedness to the school (Karcher, Holcomb, & Zambrano, 2008). Studies show that individual students’ feelings of being connected to school are influenced by their peers (Cappella, Neal, & Sahu, 2012; Resnick et al., 1993; Tarhan, Ayyildiz, Ogunc, & Sesen, 2013; Urdan & Schoenfelder, 2006).

From a developmental perspective, peer mentoring serves to promote social networks and a sense of belonging that helps adolescents develop stronger connectedness to with others. It is this connectedness that facilitates the social development of adolescents and, in turn, academic growth (Karcher, 2009). Feeling socially supported in one’s school environment “encompasses a large part of building academic resilience and encouraging positive educational outcomes for at-risk students” (Richman, Rosenfeld, Bowen, 1998, p. 311). Social support serves two main functions: it contributes to social adjustment and development and it provides a buffer against stress (Clark, 1991). Additionally, “Mentoring programs work to ensure that youth can establish

and maintain healthy relationships and that they are able to express feelings and emotions and develop healthy self-esteem” (Williams, 2011, p. 59). For the adolescent, student mentorships serve unique needs that are otherwise unmet or need additional emphasis, re-teaching, or support. Issues of attendance, student motivation and the development of self-confidence, and competency are areas in which mentors may model appropriate behaviors that lead to social growth and academic achievement through social learning (Hair, Jager, & Garrett, 2002). The social characteristics related to learning describe how adolescents navigate social learning contexts that can be conceptualized to include interpersonal skills and learning-related skills. The interpersonal skills needed by adolescents refer to the youth knowing how to respond competently in social situations, interacting positively with others, acting in a respectful manner, sharing with others, and engaging in cooperative acts (Masten, Roisman, Long, Burt, Obradovic, & Riley, 2005). Masten et al (2005) have identified that interpersonal skills are key for peer acceptance, social competence and social adjustment throughout childhood and adolescence (Masten, et al., 2005).

Mentoring provides an important role in the arena of social learning related to how youth can develop the skills and behaviors to be successful in school. The issues related to social learning are those separate from those of student achievement. Behaviors such as cooperation, self-advocacy, and attendance, active listening, following directions, and working with adults are important skills necessary for long term success that relate to positive outcomes for youth. Positive academic performance including increased school attendance and a more positive attitude about school are shown to be related to school-based mentoring relationships (McNeely & Falci, 2004). Students also report a decrease or prevention of negative behaviors such as delinquency and substance abuse (Jekielek, et al., 2002; Karcher, 2007; LoSciuto, Townsend,

Rajala, & Taylor, 1996). Finally, mentoring enhances many aspects of the mentees social and emotional development including positive social attitudes, social competence with others, increased self-esteem, and self-confidence. Mentors can either supplement or substitute for supports that parents are either unable, ill-equipped or not present to provide the adolescent with the skills he or she needs (Hair, et al., 2002). Mentors can provide supports to mentees with skills in areas such as organization, communication, relationship building, and self-esteem development.

In *The Nurture of Assumption*, Harris (1998) reviewed decades of research surrounding social behavioral and medical studies on the lasting impact of peers on children. She concluded that peers have the greatest impact on the lives that adolescents lead and on the adults that they turn out to be. The research has shown that mentoring of adolescents indicates positive outcomes across three primary behavioral areas: academics, risk behaviors, and psychosocial development (Brody, 1991; Deutsch & Spencer, 2009; Dubois, et al., 2002; Jekielek, et al., 2002). Such outcomes show that mentoring provides more than academic skill development and serves an important role in supporting students. Studies have shown that mentoring enhances many aspects of the mentee's social and emotional development including positive social attitudes, increased self-esteem, and self-confidence (Brody, 1991; Dubois, et al., 2002; Jekielek, et al., 2002). Promoting social and emotional development improves the outcomes for both mentors and mentees. Mentors are key to providing these supports to mentees. Such supports to social-emotional development include emotional regulation, esteem enrichment, cognitive assessment and emotional support (Munsch & Blyth, 1993). Other early studies identified mentoring supports to include: emotional regulation, self-esteem enhancement, situational perceptions, and social-emotional support (Dubois, et al., 2002; Jekielek, et al., 2002; Munsch &

Blyth, 1993). Given the significance of peer relationships the connections with peers in the high school setting are critical during the transition from middle school. Through supportive and successful relationships with non-parental adults, adolescents can receive emotional support, advice and guidance about various subjects that may not be completely addressed by parents (Allen, Aber, & Leadbeater, 1990).

Positive prosocial behavior with peers is a milestone of social competence throughout childhood and adolescence. The involvement of adolescents in prosocial activities serves the function of developing their awareness of the social norms and standards of the community in which they live (Lam, 2012). Adolescent demonstrations of prosocial behaviors and skills are related to peer acceptance and approval. Eisenberg, Fabes, and Spinard (2006) provide evidence that youth who spend time with prosocial peers are likely to adopt the prosocial norms of their competent peers. Through time with peers, Bandura (1986) identified that behavior patterns are observed, identified, and imitated. Here, prosocial behaviors are acquired and transmitted. Students displaying consistently positive prosocial behaviors have been shown to increased intellectual outcomes, including academic grades and standardized test scores (Kalsoom, Behlol, Kayani, & Kaini, 2012). Cross-age peer mentoring appears to be to be a significant format for developing prosocial skills among students.

Mentoring allows the facilitation of social learning that is carried over into many of the experiences universal to an adolescent's development. The modeling of prosocial skills by peer mentors addresses the efforts to increase students' success by fostering positive outcomes for adolescents through school-based mentoring programs. Studies have been designed to focus on the impact of behavioral and social outcomes for students sixth through twelfth grades involved in school-based mentoring programs (Gordon et al., 2013; Grossman & Johnson, 1999; Karcher,

2005). These studies have looked at outcomes but have not addressed the specifics of high school mentors and mentees. However, participants of school-based mentoring programs have had significantly fewer unexcused absences, higher scores on self-reports of school connectedness and significantly less discipline referrals (Gordon et al., 2013). The connectedness that students may experience through mentoring provides students with an understanding of the school system leading to positive school outcomes. Students involved in school-based mentoring programs have increased connection to school as a student because they understand the expectations at school (Karcher, 2005). This connectedness appears to raise the motivation for engaging in prosocial skills by students (Karcher, 2005). Prosocial skills are key to the foundation of overall school success for the high school student.

Synthesis of Research Findings

Mentoring with intentional partnerships that explicitly models and teaches social skills related to being a successful student result in positive learning gains for both peer mentors and mentees and allows adolescents to be on the track toward self-efficacy. For the student transitioning from the middle school setting, such peer mentorship may prove to be a critical role in the adolescent's development of key prosocial skills leading to high school success (Karcher et al., 2008). It is the social learning that will ultimately allow the adolescent to move successfully forward in the high school environment. Without internalizing the social skills that are expected for adolescents when they are participating in the educational system, students have little hope of success (Wehby, Symons, & Canale, 1998). The at-risk student often does not have these skills when entering the public high school (Kennelly & Monrad, 2007; Neild, 2009, Wehby, Symons, & Canale, 1998). According to Burke (2008), in some cases the students never have internalized these behaviors or social skills in elementary or middle school. In these

situations, students are receiving an initial exposure when entering the high school system. For others, they have forgotten the expectations and need explicit teaching and direction in the form of modeling, imitation, and teaching side-by-side a more experienced individual from their peer group (Vygotsky, 1978). For the student providing mentoring, positive psychosocial outcomes may be realized as well.

Working with an older, more experienced peer may strengthen a positive transition to the social and academic setting of the high school. Using peer mentors, rather than relying solely on teacher-directed instruction, is an effective and efficient model of social skill instruction. “If students could be taught and then, in turn, teach their peers appropriate social skills, more students in less amount of time could receive training in social skills, a content area often neglected, yet needed by a larger proportion with and without disabilities” (Prater, Serna, & Nakamura, 1999, p 33). Available research suggests that the effects are comparable to the positive effects of those reported by youth who engage in service and community learning (e.g., Snyder, Clary, & Stukas, 2000). Other important research indicates that cross-age peer mentoring accomplishes a key goal of enhancing important social characteristics of learning (Sawyer, 2001; Madsen, Smith, & Feeman, 1988).

In today’s educational system, few schools offer programs that adequately transition middle school students into the high school setting nor keep them actively involved and engaged as they transition from the freshman level to upperclassman. Many studies show that students’ experiences during their freshman year of high school will often determine their success during high school and beyond (Dedmond, 2006; Kennelly & Monrad, 2007; Neild, 2009; Williams & Richman, 2007). At-risk students often experience difficulty adjusting to high school and acquiring the social and academic skills necessary for pursuing advanced education and

training (Richman, et al., 1998). This information, found through the literature, show that the high school years are critical to the overall success of students and that programs must be in place to facilitate the transition from middle school to high school and continue throughout the high school years.

The social characteristics related to learning describe how adolescents navigate social learning contexts that can be conceptualized to include interpersonal skills and learning-related skills. *Interpersonal skills* refers to the ability to perform competently in social situations, including interacting prosocially with others. Prosocial skills with others includes: cooperating, sharing, and engaging in respecting peers (Masten, et al., 2005). Researchers have found that interpersonal skills are important for peer acceptance and social adjustment throughout childhood and adolescence (Masten, et al., 2005). I am interested in the development of prosocial skills, social capital, and school connectedness as an outcome of peer mentoring on the high school peer mentor. Additionally, I am interested in how peer mentors benefit from peer mentoring.

Critique of Previous Research

Willis, Bland, Manka, and Craft (2012) showed the potential for cross-age peer mentoring to promote socially responsible relationships among youth; however, there is an absence of literature regarding peer group mentoring of high school students mentoring other high school students. Karcher (2005) claimed that cross-age peer mentoring is the fastest growing model of school-based mentoring programs. Here, the mentoring program is structured around pairing an older youth with a younger youth. Typically, a high school-aged youth is paired or matched with an elementary or middle school-aged child (Karcher, 2007). Although there are case studies available on this form of mentoring, they typically discuss cross-age peer

mentoring in which there are several years' difference between the mentor and the mentee rather than focusing on peer mentoring within the same school between an upperclassmen and lowerclassmen acting as mentor and mentee. There is limited literature addressing the mentoring of students transitioning into the high school setting by upperclassmen already in the high school setting with only two academic years between mentors and mentees. "Mentoring provides an avenue for motivation. Older students are great sources of inspiration for the younger [students]" (Green et al., 2011, p. 12). Various studies have been conducted showing the positive impact of regular education mentors working with special education students both who are younger and who are of the same relative peer group (e.g., Lawson, 2014). Some researchers suggested the positive effects of specific cross-age peer mentors in specific arenas such as mentoring in music and art programs (Kohlhauf, Stahl, & Wachholz, 2006). These programs are indicative of my investigation of the literature into mentoring within very specific subject matters or programs within the school setting. A gap in the literature is present when considering the mentoring of the ninth grade student transitioning into the high school by an upper classman – an eleventh or twelfth grader. While studies exist indicating the effects on adult mentors, limited numbers of studies are available on the positive effects of those participating as a high school mentor.

Chapter 2 Summary

This chapter provided a broad overview of the general history of mentoring in the United States including the type of mentoring programs found in school-based program. Additionally, mentoring research and theoretical frameworks have been discussed. The literature indicates that mentoring is a useful intervention strategy for at-risk youth but also provides strong reciprocal effects to the youth mentor in terms of psychosocial outcomes.

Most of the literature focuses on traditional models of adult to youth, one-to-one mentoring models. Additionally, some research has discussed mentoring within specific disciplines such as art and music; however, these studies have been very small and unduplicated to date. The literature review did not find many studies conducted regarding peer mentoring outside of cross-age mentoring with pairings within a 2-year age difference spanning more than a between the youth mentor and mentee. Questions to pursue include the impact of mentoring on the youth mentor, the quality of training of mentor prior to the mentorship match, the support and ongoing training for mentors and recruitment of upperclassmen mentors in the high school setting. Research exploring the psychosocial outcomes for the high school youth mentors and the perceived effects as related to their own school connectedness and school success are areas necessary for future research and discussion.

Chapter 3: Methodology

Introduction to the Research Design

Research Design

This research considered the impact of mentoring on eight peer mentors and eight peer mentees from a rural high school located in Oregon. These peer mentors, while all juniors in class standing, were from varying backgrounds and volunteered to serve as peer mentors to students transitioning from the middle school to the high school. All pairings were ninth graders to eleventh graders arranged in various gender groupings: male-to-male, female-to-female, female-to-male, and male-to-female. Students' descriptions about their experiences as mentors was focused on and their relationships with their mentees was considered in terms of how they did or did not increase their personal feelings of social capital, prosocial skills and school connectedness.

A qualitative research case study was utilized for this study. Initially, a multiple case study approach was considered and rejected. The purpose for the focus on a single case study in this research was to focus on the impact of this peer mentoring program on the mentors. In this qualitative case study, I examined the perspectives and experiences of peer mentors by including the voices of the high school students about their thoughts regarding increased connection to the school, self-esteem, and overall engagement in prosocial activities. This study applied a qualitative approach to a case study of a mentoring program and focused on the descriptions of the mentors' experiences. The single case study allowed the use of multiple methods for data collection and analysis. Yin (1984) defines the case study research method "as an empirical inquiry that investigates a contemporary phenomenon within its real-life context; when the boundaries between phenomenon and context are not clearly evident; and in which multiple sources of evidence are used" (p. 23). The primary sources in this case study were interviews

with key participants, observations, and surveys. According to Tellis (1997) case study methodology assists in explaining both the process and outcome of a phenomenon through complete observation, reconstruction, and analysis of the case under investigation. With this under consideration, this project followed systematic research protocols in order to establish validity. I collected, analyzed, and interpreted the data. The following sections detail the purpose of the study, questions, and design, as well as the methods of collection and analysis.

Purpose of the Study

The central purpose of this case study was to examine the experiences of peer mentoring in a rural high school in Oregon from the perspective of the peer mentors. The secondary purpose of the study was to investigate the quality of the relationships, as perceived by mentors, related to age and gender. Student matches were based on four gender groupings: male-to-male (2 pairs); female-to-female (3 pairs); female-to-male (1 pair; female 9th grader and male 11th grader); and, male-to-female (1 pair; male 9th grader and female 11th grader). Student contacts were monitored by staff during a specifically scheduled class time and extra-curricular school activities were supervised by staff to eliminate any potential risks to participants. The staff member supervising the peer tutoring class was a classified employee with a bachelor's degree in behavior science. Her title was behavior support specialist. She was trained in the specifics of the mentor program and provided background on peer-to-peer mentoring and the goals for the program. Additionally, she participated in the initial interviews of the potential applicants for peer mentors and the meetings for selecting the mentees. The freshman counselor was available to assist her with any necessary support she needed with the mentors and/or mentees, as well as the on-site county mental health therapist.

One aspect examined in the study was what peer mentors derive from the actual peer mentoring work in terms of relationship, school connectedness, increased self-esteem, and efficacy. The secondary aspect was to identify issues that related to dynamics involving paired students to either same or mixed-gender peer mentoring relationships. In this case study, qualitative and quantitative methods were used to understand the perceived impact of the peer-to-peer mentoring relationships on mentors through their perspectives. Surveys, interviews, and observations allowed the thoughts and perspectives of the mentors to be shared and the changes that they experienced throughout the study to be documented. High school *peer mentoring* refers to the mentoring of other high school students in one-to-one relationships with the primary focus on creating the prosocial and connection skills within the school setting. The mentoring focused on the prosocial skills needed in high school. This approach is supported in the literature, since peer mentoring relationships appear to raise the motivation for engaging in prosocial skills by both mentees and the mentored students (Karcher, 2007). For mentors, there have been some reported improvements in: connectedness to school, self-esteem, self-efficacy, social skills, and conflict resolution skills (Karcher, 2007). Karcher's (2007) investigations referred to mentors increases when engaged in cross-age mentoring, typically working with elementary or middle school students rather than peers within the same school. According to Lam (2012), *prosocial skills* are the shared standards and expectations within the school culture that are considered desirable and appropriate. For the purpose of this case study, *prosocial skills* refer to skills related to school involvement, school connection, and the understandings related human capital and giving back to the school community.

Research Questions

The case study was guided by two research questions from the perspective of the peer mentor:

- 1) To what extent does peer mentoring increase the peer mentors' prosocial skills of school involvement, school connection, and social capital?
- 2) Do mentors report identifiable differences between matches that are same gender or different gender, or differences between age differences and different gender? If so, what are the reported differences? If they do not, what are the reasons for the lack of reportable differences?

Sub-Questions

- a. What is the impact or effect of mentoring on the youth mentor?
- b. What effect does the quality of training of mentors prior to the mentorship match have on the mentoring relationship?
- c. Why is it important to support and provide ongoing training for peer mentors?

Research Design

While peer mentoring programs exist throughout the United States and involve many youth mentors, most studies have been conducted with high school mentors working with elementary or middle school students rather than the relationships of high school youth mentoring other high school youth within the same school (Karcher, 2007). In order to capture the experiences of high school mentors, an exploratory case study research design was selected as the methodology for this research. I did not employ a multiple case study approach since I was focused on the impact of a particular mentoring program on the youth mentors. This research design was chosen because the investigation constructed meaning within a bounded

system of a specific group of individuals during a specific time frame (Yin, 2014). I was interested in how peer mentors “interpret their experiences, how they construct their worlds, and what meaning they attribute to their experiences” (Meriam, 2009, p. 5). The case study research design was the plan for addressing the research questions considered for this study because it provided the most information about the perspectives of the participants. Since each peer mentoring relationship is unique and involves experiences not only of the mentee but also of the mentor, there was a need to acquire information about the experiences of the mentors and identify if these experiences promoted self-esteem, prosocial, and social capital skills. Interviews allowed the peer mentors to consider their experiences as peer mentors and reflect on their impact on their mentored peers.

I collected, recorded, analyzed, and interpreted data. Tools to collect data included surveys, interviews, documentation review, observation, and the collection of physical artifacts such as mentor notes of meetings with mentees. The behavior support specialist, a counselor and a freshman teacher were trained to assist in administering, and collecting the surveys. As the primary researcher, I was responsible for the coding, analyzing and interpreting of the data.

As the study progressed, it was evident that this was an exploratory case study. Yin (1984) noted exploratory case studies as those set up to explore any phenomenon in the data which serves as a point of interest to this research. For example, the research questions were created to ask “if” peer mentoring impacted mentors and “if so, how?” The research questions were intended to allow for a further examination of the phenomenon observed. In this case study also, prior studies surrounding mentoring had been reviewed before the research questions and hypotheses were considered. This initial work assisted in creating the framework for this study.

Target Population, Sampling Method and Related Procedures

The target population for this study was eight high school peer mentorships pairs—mentors and mentees. There was established research available about the benefits of peer mentoring at various ages for mentees and the impact of mentoring on adult mentors (Jeielek, Moore, & Hair, 2002). However, little was discovered in the scholarly literature or empirical studies about the potential impact of mentoring on adolescent mentors themselves serving as high school peer mentors with other high school students in peer-to-peer mentoring programs. There are studies supporting the positive effects mentoring with college age and high school mentors and younger mentees (Karcher, 2007, 2005). Studies have shown that “there is evidence that cross-age peer mentoring can have beneficial effects for both the mentees and the mentors who provide it” (Karcher, 2007, p. 7). Additionally, research exists to support the positive impact of peer modeling (Gordon, Downey, & Banger, 2013; King, Vidourck, Davis, & McClellan, 2002; Portwood, Ayers, Kinmson, Waris, & Wise, 2005). Since both lower class and upper class students are found in most high school settings, the possibility of utilizing slightly older, more experienced peers to mentor slightly younger, less experienced peers is readily available as a strategy to promote prosocial and positive social capital behaviors (Karcher, 2005).

Originally, I identified 20 pairs as the number to work with for this study and quickly realized that this would be too many to manage within a qualitative case study. With 20 mentors and 80 formal interviews, it did not seem reasonable to conduct 40 of interviews, transcribe those interviews and code them accurately within one academic semester. As a result, I decided that two pairs from each gender combination group would be manageable within a qualitative case study. Such numbers would be reasonable to collect, analyze, and code data. Although this was a small scale, single site study, it provides valuable information for further research and inquiry.

The qualitative data was rich and the interviews provided insights into the mentors' perspectives not only about their mentees but about themselves.

Purposeful sampling was employed for this case study research. Purposeful sampling allows the sample to be selected in such a way that the researcher can discover the most possible from the data (Merriam, 2009). In this case study, peer mentors were selected for the program through an application system. This type of purposeful sampling utilized critical case sampling (Patton, 2002). Patton explained that critical case sampling is a form of purposive sampling that is useful in exploratory qualitative research where a single case study is being employed. Patton further discussed that critical case sampling can be decisive in explaining the phenomenon that is of interest to researcher. Patton (2002) explains that critical cases should not be used to make statistical generalizations. Critical cases, however, can be helpful in making logical generalizations. It is with this methodology in mind that this case study was designed.

The application that was used has been developed from a previously developed application based on The ABC's of Mentoring, and Governor's Mentoring Partnership (Appendix A). Applicants were selected by high school counselors based on grade point average, availability in scheduling to enroll in the peer mentoring class, interest, commitment to engage with another student, and history of attendance or involvement in school activities. Neither mentors nor mentees were students that I was acquainted with prior to their involvement with the program. Peer mentees were referred for mentoring by the middle school based on high risk characteristics as decided by the 8th grade team of core teachers along with the eighth grade counseling team. These risk factors were primarily related to a lack of prosocial school skills both related to academics and poor social skill functioning. Each at-risk incoming ninth grader possessed the following characteristics: (a) greater than 15% absenteeism, (b) multiple failing

grades, (c) no school activity or sports involvement, and (d) two or fewer friends self-identified. Once participants were identified for the study, I met with the peer mentors and mentees and provide them with an informed consent form to take home with a letter to parents/guardians (Appendix B). A parent informational meeting was held to provide general information about the goals of the peer mentoring program, research study, its purpose, and the general timeline of the design. Additionally, a copy of the informed consent was provided to parents to sign prior to the study. The consent form was given to each participant before the interview, and participants were given the opportunity to review and sign the document to secure their assent as well.

Field notes were another aspect of data collection in this case study (Appendix D). I was able to document observations, both of specific individuals and of the overall setting of the mentors and mentees during their formalized meeting times. Actual contents of the field notes included descriptions, impressions, and my comments. These notes contained information shared by the mentors that provided evidence with which to address the research questions being investigated.

Interviews are primary sources of data collection in case study research (Merriam, 2009). The respondents were all protected through the use of pseudonyms. Since all participants were minors, interviews were not videotaped. The interviews were audio recorded with the permission of participants and transcribed verbatim as soon as possible after the interviews were concluded. During the interviews, I took notes and wrote comments as they occurred to me. Additionally, I wrote any new questions or specific thoughts that occurred to me immediately following the interview. Appendices related to the interviews are found at the end of this research document. Appendix E represents the interview protocol and a list of questions for the student interview protocol.

Surveys were provided to participants and were coded with a specific number to match the number of the specific participant. Survey results were analyzed both at individual and aggregate levels. Appendix F represents the survey.

Instrumentation

The Hemingway Measure of Adolescent Connectedness is a measure of adolescent connectedness in the published literature (Herrera, Grossman, Kauh, Feldman, & McMaken, 2007). It has been used in a variety of research studies and has been empirically tested and found to be a valid measure of connectedness (Karcher, Holcomb, & Zambrano, 2008). This survey, in its short version, is appropriate for this study as it measures adolescents' connection and social and school involvement. Permission to use this survey during the course of this study was secured via email correspondence from Dr. Michael Karcher who developed this instrument and is found in Appendix F.

Data Collection

I obtained parental consent for each participant prior to the initial meeting with the participants. Then I met with the individual participants and reviewed the consent form with each individual participant prior to the beginning of each interview. Interviews were conducted individually. The purpose of briefly reviewing the consent form was to reassure participants that they had the opportunity to discontinue participation at any time and they could agree or disagree to participate. All interviews were held in the same location (a study room in the high school) were audio recorded and lasted no longer than 30 minutes.

The same interview protocol was used for all participants. Participants responded to 10 total questions. The interview protocol is located in Appendix E. The questions were written to determine if serving as a peer mentor promoted the participants' prosocial skills, school

connectedness, and feelings of social capital. All interviews were audio recorded for later verbatim transcription. The interview was structured in order to allow me “to respond to the situation at hand” and to ask follow up questions during the interview to clarify situations or circumstances (Merriam, 2009, p. 90).

Participants were also given the Hemingway Adolescent Connectedness Survey–Short Version at the beginning of this research, September 18, 2015, at two different points (October 28, 2015, November 24, 2015), during the case study, and at the end of the study (and December 16, 2015). The short version was chosen due to its focus on the individual, peer interactions, and connection to the school environment. The long version of the survey expands on connections with parents, family, and activities in the larger community. Each participant was given the survey four times with the intent to provide data about the participants’ level of social support, attachment, sense of belonging, sense of relatedness, and adolescent connectedness. This connectedness survey related to the participants’ prosocial skill development, school connectedness, and thoughts about social capital.

Data Analysis Procedures

This study relied on the following sources of information: a series of interviews with eleventh grade mentors, pre/post data from the school related to academic grades and attendance, participant surveys, and observations of the interactions between mentors and mentees. The attendance data was measured quantitatively for change over time. Given that this study spanned only one academic semester, there were very few absences recorded among either the mentors or mentees. With only a four-month period studied, it was difficult to assess whether or not academics were impacted by the mentoring program. Therefore, the academic data was not a main factor in this study. The other data from these sources was placed in categories. Over

time, these categories were compared to the original categories, which provided different perspectives for the themes and insights that emerged. These new thoughts about the data may have been from viewing the data with a fresh perspective after some time away from it. Viewing the data and coding over a period of time, in several different sessions, allowed me to consider the data with a fresh perspective each time. After each interview and scale completion occurred, time was allowed for me to reflect which initiated new inquiry and consideration regarding the participants' perspectives and experiences.

Following the individual student interviews, I wrote my notes and any additional questions or thoughts regarding the interviews immediately following each interview. Then I transcribed the audio recorded interview session. Each interview transcript was assigned pseudonym code number-letter combination to protect the privacy of the participants. All participant responses were transcribed verbatim. I organized the responses using index cards, matching response with corresponding questions. This allowed me to systematically present the data in Chapter 4.

I pursued qualitative data analysis and used a priori and emergent coding. The organization of the data began using open coding. I read through the data several times and create tentative labels for the data (Strauss & Corbin, 1990). I created broad terms related to what emerged and established properties of each code. From here, I moved into an axial coding process, identifying the relationships among the open codes. Here, I searched for connections among the a priori codes. Strauss and Corbin (1990) believed that the purpose of axial coding is to make "connections between a category and its subcategories" (p. 97). Finally, I selectively coded, identifying the core variable/s that includes all of the data. It is the "process of integrating" all of the information. (Strauss & Corbin, 1990, p. 143). The selective coding

required the re-reading of interview transcripts and selective coding of any data that related to the core variable/s that were identified.

In addition, I analyzed the observations by re-reading and sorting through all observation field notes. For each written page of notes, I took the key pieces of important information, writing them on index cards and laying them out under labeled headings. I continued this process until I had sorted through all the notes. Then, I began the process of matching traits and characteristics from the observation data to other collected data. This triangulation of data allowed me to narrow and refine the data matching the strongest similar concepts and ideas from each data source. I color coded these key concepts using colored tab as headings. I re-read all research data sources while color coding the key concepts to ensure that I have not missed any data. I carefully placed all combined data onto new poster paper. As discussed in Baxter and Jack (2008), I also decided to use a computer aided qualitative data analysis software to assist in collecting and organizing data so that double-coding could occur.

The data analysis consisted of examining, categorizing, tabulating, and recombining data obtained from the research. After each interview data and survey data, I read and sorted student responses into categories placing similar responses in to the same category. I put these responses on large poster for ease of use and saving. This allowed me to sort the responses under appropriate headings, organize, and view the data. The data analysis involved coding processes. First, I listed each of the a priori codes that I derived from the research questions and literature. Then I listed each of the a priori codes on a code sheet along with the definition of what each code meant. I anticipated that another set of codes would emerge from the reading and analyzing of the data. These emergent codes became the concepts, actions, relationships, and social meanings that arose from the data and were different from the a priori codes. These codes also

required an explanation and definition listing and went onto a code sheet. I also needed a system to organize the codes and a systematic way to categorize the data in an attempt to make sense of the phenomena presented. A collection process utilizing notecards and paper was one method of categorizing data that was used. A second method that employed computer aided qualitative data analysis software for double-coding was also implemented. Words and phrases were the primary method of coding the data. Newly collected data was coded and then compared to previously collected data in an ongoing manner. This process allowed me to develop an understanding of the mentor's perspectives and their relationship to other perspectives. Throughout any research study design phase, researchers must ensure that the study is constructed to ensure validity and transferability. By utilizing the Hemingway Connectedness Survey-Short Version construct validity demonstrated the use of correct measures for the concepts of adolescent connectedness and social capital being studied. Internal validity was demonstrated by the use of multiple pieces of evidence from multiple sources. Since the research design allows for well-documented procedures to be repeated, this was the best research design for this case study.

Utilizing Denzin's (1978) basic types of triangulation. I employed data triangulation, investigator triangulation, theory triangulation, and methodological triangulation. Data triangulation using several sampling strategies was employed. For example, I compared observational data with the interview data. I compared what was said during the mentoring sessions with what the mentors said during school activities and on the surveys looking for consistency over time. As discussed by Denzin (1978), within-method triangulation and investigator triangulation involves cross-checking for internal consistency. This type of triangulation allows the gathering of data at different times, in different social situations, and

from different people. This was done through interviews and surveys with different people throughout the case studies. Theory triangulation was employed by using multiple perspectives to analyze and interpret the data. Finally, methodological triangulation allowed me to confirm ideas, patterns, and themes in the data by identifying them using multiple methods.

Limitations of the Research Design

The goal of this case study was to understand a situation from the participant's perspective and it is possible for individuals to interpret the same events differently and derive different conclusions. Each case study may not reflect the behavior of most individuals in similar settings under similar conditions. "Because qualitative research occurs in the natural setting it is extremely difficult to replicate studies" (Wiersma, 2000, p. 211). This case study has limitations due to the small sample in comparison with the larger population of high school students. It is difficult to make causal conclusions from any case study (Simon & Goes, 2013). Causal conclusions cannot be made with this this particular study because alternative explanations cannot be completely ruled out (Simon & Goes, 2013). This case study involved the behaviors and experiences of a small group of individuals in a particular setting. This particular case study research does not allow for a reliable generalization (Brutus, Aguinis, & Wassmer, 2013) to be made to all high school populations. It does, however, offer perspectives of some students.

Expected Findings

The first research question was: "to what extent does peer mentoring increase the peer mentors' prosocial skills of school involvement, school connection and social capital?" I expected that peer mentoring would increase the peer mentors' prosocial skills as reported through the surveys and interviews. These increases would likely be related to school

involvement, school connection, and social capital as measured by the Hemingway Connectedness Survey-Short Version. Additionally, these would be self-reported in the interviews. During the coding process, I specifically looked for responses that addressed increases in school involvement, school connection, and social capital. By virtue of modeling the role of a high school student to the mentees, the mentor was likely to be more involved by reporting to attend more school activities per month and, therefore, more connected to his or her school through these activities. Additionally, it was anticipated that the act of cultivating a relationship with a younger student and building social capital will build self-esteem and efficacy in the mentor as measured by the Hemingway Connectedness Survey Short Version.

The second research question was “do mentors report identifiable differences between matches that are same gender or different gender, or differences between age differences and different gender? If they did, what were the reported differences?” During the coding process, I looked for any reported differences between mentoring pairs based on gender or age differences. The Hemingway Survey would not likely provide information in this area; however, the interviews and observations would likely provide specific information to answer this question. I believed that mentees would report that they identified more closely with peers of the same gender. I also thought that there would be little to no difference between the differences of same or different gender matches in terms of the mentors’ experiences regarding social capital and giving back to the community.

Ethical Issues

Ethical issues are present in any form of research. Research should not put the participants at risk of harm or discomfort. In this study, there was negligible chance of physical

harm. Safeguards were put into place to reduce the risk of possible psychological distress, invasion of privacy or protection of confidentiality, or social disadvantages.

It was imperative to protect the rights of participants by maintaining privacy and confidentiality. All participants had the freedom to discontinue participation at any time during the study without reprisal. Additionally, their involvement in the study was not related to their placement in academic courses or school activities. Participation or lack of participation did not affect students' grades or school privileges.

Researchers must be diligent and prepared to address the unpredictable nature of qualitative research and its inherent issues (Batchelor & Briggs, 1994). In this study, it was important for me to maintain the role of researcher and not become an active participant so that ethical issues related to psychological or social distress could not arise from a conflict in the types of interactions that could potentially occur between researcher and participants. It was also imperative to be aware of the possible issues of power that could have arisen between two age groups of mentors and mentees. The very fact of the mentors being older and more experienced than the incoming freshman who are less experienced and younger could have potentially led to the mentees occupying a less equal role in the developing relationship between mentor and mentee. Additionally, the mentees were specifically identified for the program from the list of socially at-risk students transitioning from the middle school. Students whose critical skills and experience levels are developing, and who are younger, already enter the mentoring relationships at a potential disadvantage in comparison to the slightly older mentors who are selected based on their demonstrated prosocial skills.

Several safeguards were implemented to eliminate potential relationship inequities based on age or gender. These safeguards included providing training for all mentors. Providing a

specific class period for mentors and mentees to meet and a trained adult staff member during this class period to facilitate the mentoring relationships, supervised school social activities for students, access to a mental health therapist either staff referred or participant referred, regular individual check ins with all participants, and debriefing after surveys and interviews.

This study relied on interviews, surveys, and observations. Ramos (1989) described three main ethical issues in qualitative research: the researcher/participant relationship, the researcher's subjective interpretations of data, and the design itself. It was critical to not be deceptive or to withhold information during this study. Since it was difficult to predict the impact of the research on a participant, I needed to anticipate the possible outcomes. For example, it was important for me to consider if the peer the relationships would be helpful or harmful to participants. With any relationship, deliberately construed or not, there is a risk that the parties may not get along or know how to communicate in a positive manner. It was likely that because the lower classmen in this study were already identified as at-risk, with lower social skills, the probability of difficulty relating with other students was a concern. Additionally, I considered if the students involved in the program would suffer any possible social repercussions for their participation in the mentor program. I also considered how other students in the school respond to the students involved in the program. Another consideration that was made was to be prepared to address any sensitive issues or conflicts of interest if they were to occur. It would have been imperative to address such issues. One way that to avoid the potentiality of these issues occurring was by creating a mentoring program during a specific class period designated for the pairs to meet where they were supervised and guided during their meetings with a gradual release of responsibility to the mentors. The behavior support specialist directed and supervised this class period acting as a trainer and consultant for the mentors and mentees. The mentors

also attended two trainings prior to the program beginning to help prepare them for their role as a mentor.

All participants had access to a licensed social worker during the course of the study and beyond. If the students were exposed to information that was revealed to them by their mentor relationship, they were able to self-refer or were referred to the therapist for individual counseling and guidance. The research site had a full-time county mental health therapist on site during the school day who has committed to partnering with this study and is available to meet with students should they require counseling assistance. Additionally, during the informed consent process, I reviewed the mandatory reporting requirements in the event that certain information related to abuse is disclosed. Participants were not assured privacy or confidentiality in these matters and my role as an educator would require me to report for the protection of the minor participant. Finally, data is being securely stored in a locked office at the research site for 3 years and will then be destroyed to ensure the protection of the participants.

Chapter 3 Summary

This chapter explained the process of the research design for this study and how this case study occurred. A rationale for the methodological decisions for this study was provided. The purpose, methodology and methods help illuminate the various complexities included in this case study: data collection process, analysis, and potential ethical issues with respect to the relationships between peers or the information that may be disclosed during the peer mentoring relationship are discussed. The explanation of the types of coding of data was presented in this chapter as well as expected findings. Finally, a consideration of limitations of this case study research and how potential ethical issues were addressed for this study were identified.

Chapter 4: Data Analysis and Results

Introduction to Chapter 4

The purpose of this case study was to record and analyze students' experiences with a peer-to-peer cross-age peer mentoring program. By utilizing a case study research design, student perceptions of their mentoring experiences were described and analyzed in order to evaluate the impact of a cross-age peer mentoring program on mentors.

Brief Overview

The case study research design addressed two primary questions as they provided the most information about the perspectives of the mentors in relation to their involvement with the mentoring program. Since each peer mentoring relationship is unique and involves experiences not only of the mentee but also of the mentor, there is a need to acquire information about the experiences of each mentor and identify if the experience promotes self-esteem, prosocial, and social capital skills. Interviews allowed the peer mentors to consider their experiences as peer mentors and reflect on their impact on their mentored peers. The data collected were examined to determine how aspects of school connectedness, social capital, and self-esteem related to the impact of the mentoring experience on student mentors. I hypothesized that mentors would experience increases in school connectedness, social capital, and self-esteem during their participation in the peer mentoring program.

This chapter examines the role of high school peer mentors and their experiences mentoring incoming freshman in the high school setting. Key to this study were the experiences of the mentors and the impact of participating in the peer mentoring program. An additional focus addressed how mentor participation increased prosocial skills of school involvement, school connection, and social capital.

Description of Purpose

The central purpose of this case study was to analyze the impact of the peer mentoring program on high school mentors. The secondary purpose of the study was to identify issues related to mentoring matches specific to age and gender. The following research questions informed this study:

- 1) To what extent does peer mentoring increase the peer mentors' prosocial skills of school involvement, school connection, and social capital?
- 2) Do mentors report identifiable differences between matches that are same gender or different gender, or differences between age differences and different gender?

If they do, what are the reported differences? If they do not, what are the reasons for the lack of reportable differences?

Sub-Questions

- a. What is the impact or effect of mentoring on the youth mentor?
- b. What effect does the quality of training of mentors prior to the mentorship match have on the mentoring relationship?
- c. Why is it important to support and provide ongoing training for peer mentors?

This chapter begins with a brief review of the structure and purpose of this cross-age peer mentoring study. Next, the chapter describes the research population and sample. An explanation of the research methodology and analysis is then discussed. A full explanation of the manual coding process and then, further coding that was accomplished using ATLAS.ti follows. Here, each research question is addressed and this includes an analysis of the perspectives of mentors about their experiences, school connectedness, school involvement, and development of social capital, followed by an analysis of the perspectives of mentees about their

experiences within the mentoring relationship. A summary of the findings and presentation of the data based upon the codes that emerged follows. Finally, results and analysis of the interview transcripts using the codes were discussed. In Chapter 5, I interpreted the study's results in light of the literature as well as future recommendations for investigation.

Overview Description of Data Analysis, Results, and Findings

Through the Hemingway Measure of Adolescent Connectedness–Short Version and in one-on-one interviews, study participants described their perceptions and experiences with peer-to-peer mentoring, school connection, social capital, and self-esteem and self-efficacy. The research findings that this chapter reports are based on analysis of the following data sources: semi-structured interviews; written observations I composed; and documented conversations with the staff involved with the mentoring program. Findings from the survey data were not statistically significant. Descriptive data were gleaned from the survey, which provided some information that is reported in the findings section.

Researcher's Role

My role in this study necessitated the identification of personal values, assumptions, and biases during the design phases of this study. After 13 years of work with staff and students at the high school level, I noticed an untapped resource in the high schools. I noticed that upperclassmen were a valuable yet underutilized resource by the school system to assist with the transition of at-risk freshman into the high school system. I often had employed adult mentors in the programs in which I worked. However, I had found that when I had worked with high school peer tutors, younger students seemed more receptive and the peer tutors appeared to be more committed and involved in the tutoring relationships. I often wondered if creating peer-to-peer

mentoring programs in high schools would build social efficacy among the mentors and, thus, increase the overall network of social capital.

With a background in sociology and child development theory, I continued to be interested in the prosocial skills of high school students in leadership and volunteer positions as I entered into school administration. When I accepted a position as assistant principal in a small rural town in Oregon, it was my hope to create programs that would utilize upperclassmen and their experiences as high school students to assist lower classmen in the transition process. I found that this rural high school was interested in and in need of such a program, and saw the potential for a pilot program and a study of its implementation. I served as an administrator at the high school for one year prior to the study and was familiar with the staff involved with the study. I believe my background in secondary education, work with at-risk youth and alternative education, and experience with student leadership and volunteerism enhanced my awareness, knowledge, and sensitivity to the issues addressed in this study. Although every effort was made to ensure objectivity, my personal bias undoubtedly has shaped the way I view and understand the data collected. This personal bias may be a potential limitation in this study. With this in mind, I have worked to control this bias in the analysis and presentation of results.

Description of the Sample

Student matches were originally planned to be based on four groupings, with equal numbers reflected in each: male to male, female to female, female (9th) to male (11th) and male (9th) to female (11th). Due to the small sample size, these groupings were not equally distributed. Formal student peer monitoring contacts were monitored by staff during a specifically scheduled class time, and extra-curricular school activities were supervised by staff to eliminate any potential risks to participants. I was particularly interested in understanding

whether mentors noticed changes in their relationships, school connectedness, self-esteem, and self-efficacy that were taking place during the mentoring program. Secondly, I was interested in identifying issues that relate to dynamics involving paired students to either same or mixed-gender peer mentoring relationships.

The idea of a peer mentoring program was considered in January of 2015, and initial meetings to plan for such a program began in the early spring of 2015. The rationale behind implementing a peer-to-peer mentoring arose from an investigation of research about the effectiveness of transition programs in the freshman year of high school as a vehicle of positive change for academic achievement and school behavioral outcomes. The formalized group transition programs were discarded as an option for this school at that time, due to the nature of the small rural setting in which this high school was located and potential costs involved. It was decided that a pilot program would be developed with the intent to permanently implement it at this high school using the data from the pilot year to evaluate and improve the program for the future.

Once a decision was made to implement the program, the actual people involved in the work on the program consisted of myself as the primary researcher (also a school administrator), a behavioral specialist, a mental health therapist/advocate, a ninth grade counselor, and a leadership advisor (also a licensed teacher on staff). Potential peer mentees were recruited by the eighth grade teams; 68 names were initially provided to the ninth grade counselor of incoming freshman who met the criteria as a mentee. Peer mentees were referred for mentoring by the middle school based on at-risk characteristics as decided by the eighth grade team of core teachers along with the eighth grade counseling team. These risk factors were related to a lack of

prosocial school skills both related to academics and poor social skill functioning as described by school staff.

Each at-risk incoming ninth grader possessed the following characteristics:

- greater than 15% absenteeism;
- multiple failing grades;
- no school activity or sports involvement; and
- two or fewer friends self-identified.

From that list, nine students had moved out of the school district during the summer, one student was in a juvenile facility, and two students were already participating in a mentoring program through a foster care program, leaving 56 potential participants. Of the remaining students, 37 students were male and 19 were female. The high school counselor randomly chose 10 males and 10 females from the eighth grade at-risk list to participate in the study.

Applicants for peer mentors were selected by high school counselors based on grade point average, availability in scheduling to enroll in the peer mentoring class, interest and commitment to engage with another student, and history of attendance or involvement in school activities. It was important that students interested in participating had knowledge of the school and its offerings and also were willing to connect with another student who were less experienced. Thirty-two students applied and met the criteria as mentors. From these 32 applicants, 20 had schedule conflicts and were unable to enroll in the companion course, 2 moved to another high school, and 2 were unable to secure parental permissions. One student volunteered to remain as alternate should another potential mentor not be able to enroll, participate, or remain in the program. This student was never called upon to participate in the

study. Neither mentors nor mentees were students that I was acquainted with prior to their involvement with the peer-to-peer mentoring program.

There were 14 high school students participating in this study. They ranged in age from 14 to 17 years old; seven were female, and seven were male. There were three male participants and four female participants assigned as mentors. Three male participants were mentees; four females were mentees. None of the participants had ever participated in a mentoring or tutoring program prior to this study. For reporting purposes, and to protect participants' identities, each participant was assigned a pseudonym consisting of numbers and letters. At the time of the study, one high school was involved where the peer-to-peer mentoring program was implemented.

Once potential participants were identified for the study, I met with the possible peer mentors and mentees to provide an overview of the program, answer questions, and provide them with an informed consent form to take home with a letter to parents/guardians (Appendix B). Initially, an informational letter was also provided to the potential participants containing general information about the goals of the peer mentoring program, research study, its purpose, and the general timeline of the design, data collection, analysis, and final results (Appendix C). During the information session, both potential mentors and mentees appeared enthusiastic about the program and indicated interest in completing the required paperwork for the study as well as the course request.

In subsequent days, few potential participants returned with necessary paperwork. I contacted these potential participants who stated that, while they were interested, they had schedule conflicts. Far more potential mentees cited this conflict than potential mentors. Only seven potential mentors cited schedule conflicts such as sports practices, activities, work, or

other required courses as their main conflicts. I conducted detailed conversations with parents or guardians of potential mentees via telephone. While these parents indicated support and high interest in the mentoring program, there was reluctance on the parents' parts to ask their students to enroll in the corresponding course in lieu of chosen electives. This theme among the parental conversations was recurring and was an unexpected obstacle to recruiting a larger sample for this study. Previous experiences in this rural high school setting were inconsistent with this response. Many parents had previously asked counselors and administrators, as well as indicated on school surveys, for increased options for transition support for freshman. The high interest yet lack of completion to enroll in the mentoring program was unforeseen and unplanned for in the early phase of this study which was a potential limitation of the study.

Despite the effort in obtaining parental consent, the counselor continued to provide names from the potential mentee list to allow for complete peer-to-peer matches until an equal number of mentor-mentee consents were obtained. Due to the difficulty obtaining participants, the final participant sampling was smaller than the original projection, and the gender/age configurations were not those originally expected for the study sample and may have been a potential limitation of the study. This was also not a consideration as a potential or probable obstacle in the planning of this case study. Despite these unforeseen issues, the case study proceeded as planned. The only change occurred in the anticipated number of actual participants.

The final participant sample included 14 total participants: six males and eight females. Three males were assigned as mentors. Three males were assigned as mentees. Four females were assigned as mentors; four females were assigned as mentees. The configurations were as follows:

Table 1

Mentor/Mentee Configurations

Pairings	Mentor	Mentee
	Junior	Freshman
Pair 1	male	male
Pair 2	male	male
Pair 3	male	female
Pair 4	female	male
Pair 5	female	female
Pair 6	female	female
Pair 7	female	female

Table 1. Illustrates the mentor/mentee matches by age and gender configurations.

Research Methodology and Analysis

Description of Analysis Method's Fit for the Study

In Chapter 1, I introduced the study by providing an overview of peer mentoring, the purpose of the study, and the conceptual framework. In Chapter 2, I presented a review of the relevant literature beginning with a history of mentoring and various types of mentoring programs in the United States. I also focused on current research pertaining to cross-age peer mentoring, models of peer mentoring programs, and evaluation of peer mentoring programs. As discussed in Chapter 3, this research primarily emphasized utilizing a single case study approach. Yin (2008) explained “a single case may meet all of the conditions for testing the theory” (p. 40). Single case studies are appropriate when a single site is characterized as being *extreme* or *unique* (Yin, 2014). The research site was unique because it implemented high school students as mentors to other high school students which is not commonplace for secondary schools within

the Northwest. This single case study was also exploratory in nature. Yin (2014) advised the goal of exploratory case studies to be that of developing hypotheses and propositions for further inquiry. However, after data were synthesized, areas of future research were found and are discussed in Chapter 5. To ensure the experiences and reflections of the mentors were fully explored at the school level, transcripts from all interviews were coded and analyzed for the prevalent themes.

The Chapter 3: Methodology provided detailed information regarding the participants and the procedures utilized to gather data for this study. It also described the specific steps employed throughout the course of the study to collect the most accurate information to address the research questions. The results of the study are presented in this chapter, which begins with a description of relevant participant demographics. In the additional sections, the data gathered are presented for each of the study's five research questions. This chapter provides results that were revealed through qualitative methods and aligned with the original questions this study sought to answer. The degree to which the results met the goals and purpose of the study are discussed in the conclusion of this section. I acknowledge that this case study, with its limited number of participants from whom data were collected, will only serve to provide general information that may inform future program effectiveness with respect to addressing the research questions. Both statistical measures and descriptive data were utilized and analyzed in this study.

Case Study

As discussed in Chapter 3, my research design primarily utilized a single, embedded case study approach. This single case study was also exploratory in nature. Yin (2003) stated that exploratory case studies “should state the purpose as well as the criteria by which an exploration

will be judged successfully” (p. 22). Last, Yin (2003) advised the goal of exploratory case studies to be that of developing hypotheses and propositions for further inquiry.

I reviewed the consent form with each individual participant prior to the beginning of the four scheduled interviews. The purpose of briefly reviewing the consent form was to reassure participants that they had the opportunity to discontinue participation in the interview at any time. Interviews were conducted individually and lasted no longer than 30 minutes. All interviews were held in the same location, a study room in the high school, and were audio recorded for later transcription. Interviews only were conducted with the mentors since the primary focus of the study was on the mentors’ prosocial skills, school connection, and social capital development during this case study. The 10 questions that were asked throughout each interview were the same questions asked of each participant (Appendix E). The questions were written to determine if serving as a peer mentor promoted the participants’ prosocial skills, school connectedness, and feelings of social capital. The interview was structured in order to allow me “to respond to the situation at hand” and to ask follow up questions during the interview to clarify situations or circumstances (Merriam, 2009, p. 90).

Participants, both mentors and mentees, were also given the Hemingway Adolescent Connectedness Survey – Short Version (Karcher, 2011) a total of four times: at the beginning of this research, at two different points during the case study, and at the end of the study. A total of 56 surveys were administered over the course of the study. The surveys provided demographic information such as gender, age, ethnicity, and living circumstances. Additionally, the survey provided data about the participants’ level of social support, attachment, sense of belonging, sense of relatedness to peers, neighborhood and school, and adolescent connectedness. The short version was chosen due to its focus on the individual, peer interactions, and connection to the

school environment. The long version of the survey expands on connections with parents, family, and activities in the larger community. This connectedness survey relates to the participants' prosocial skill development, school connectedness, and thoughts about social capital. Hemingway Measure of Adolescent Connectedness–Short Version is an established measure of adolescent connectedness in the published literature (Herrera, Grossman, Kauh, Feldman, & McMaken, 2007). It has been used in a variety of research studies and has been empirically tested and found to be a valid measure of connectedness (e.g., Karcher, Holcomb, & Zambrano, 2008). Additionally, studies have been successfully completed utilizing this measure as a baseline and post assessment tool (Chan, Rhodes, Howard, Lowe, Schwartz, & Herrera, 2013; Karcher & Lee, 2002)

Chan et al. (2013) conducted a study in which students were assessed at the beginning and end of the school year specifically addressing mentoring relationship quality. The researchers found that mentoring quality was significantly associated with positive changes in youths' relationships with parents and teachers, as measured by subscales of the Inventory of Parent and Peer Attachment, the Teacher Relationship Quality scale, and the Hemingway Measure of Adolescent Connectedness (Chan et al., 2013). The researchers found positive significant correlations between post-assessments and mentoring quality and baseline assessments, including parent and teacher relationships, academic attitudes, self-esteem, and misconduct (Chan et al., 2013). Karcher and Lee (2002) utilized the Hemingway Connectedness Scales multiple times in the same study and examined mean differences in the five connectedness subscales across seventh, eighth, and ninth grades, three times to see if youth reported less connectedness to mother, father, and peers and greater connectedness to friends and to self across these age groups. All four of the composite scales and most of the subscales demonstrated

properties of validity and reliability with this Taiwanese junior high sample (Karcher & Lee, 2001). These findings suggested that the measure is reliable and valid. The results of the second set of analyses were also consistent with studies of youth in the United States in relation to the importance of social and academic connectedness in self-connectedness. The researchers successfully cross-validated the study with Taiwanese youth with the structural studies of adolescent connectedness found with adolescents in United States youth (Karcher & Lee, 2002). The Taiwanese youth subscale's higher correlations with connectedness to school, teachers, and friends suggest it is similar to the connectedness of United States youth.

The Hemingway Measure of Adolescent Connectedness Survey-Short Version was used to determine if there were changes during the period of the study while involved in the peer-to-peer mentoring program, particularly, in the mentors' school connectedness, social capital, and self-esteem and self-efficacy. Karcher (2004) further outlined the importance of the ecology of adolescence connectedness including the micro-systems that adolescents experience daily. "Microsystems include youths' important relationship . . . in school with teachers and peers, and in the neighborhood with friends" (p. 5). The general definition of adolescent connectedness described in the Hemingway is "the degree of activity and positive affect youth report that they direct toward people, places, and things" (Karcher, 2004, p. 5). Regarding "*people*," the Hemingway Measure of Adolescent Connectedness-Short Version includes connectedness to parents, siblings, peers, friends, and teacher subscales. Regarding "*places*," the Hemingway includes connectedness to school and neighborhood subscales. Regarding "*things*," the Hemingway includes connectedness to reading, self-in-the-present, and self-in-the future subscales (Karcher & Sass, 2010).

Hemingway Survey Analysis

To assess the microsystems of the mentors and the ecology of connectedness of the mentors, a one-way within-subjects analysis of variance (ANOVA) was conducted with the factor being the number of weeks mentoring in the mentoring program and the dependent variables being connectedness to peers, self-in-present, and connectedness to neighborhood scores. The data from these surveys was from a small sample. Repeated measures were conducted by very small differences. There was little data to arrive at conclusions or make inferences from the data.

The means and standard deviations for connectedness to peer, self-in-present, and connectedness to neighborhood scores are presented in Table 2 . Table 2 shows the scores across each of the four survey administrations reflecting the dependent variables of connectedness to peers, self-in-present, and connectedness to neighborhood. The results of the ANOVA indicated no statistical significance in the *duration of mentoring* effect, Wilks's $\Lambda = 0.74$, $F(2,5) = 0.85$, $p = 0.48$ (peers); Wilks's $\Lambda = 0.94$, $F(2,5) = 0.15$, $p = 0.86$ (self-in-present); and Wilks's $\Lambda = 0.508$, $F(2,5) = 0.24$, $p = 0.49$ (neighborhood). These results were not statistically significant but are reported in the following tables by duration.

Table 2

Means and Standard Deviations Scores for Peer, Self-in-Present, and Connectedness to Neighborhood

Time	Peer		Self-in-present		Neighborhood	
Duration of Mentoring	M	SD	M	SD	M	SD
1	3.74	0.45	3.93	0.85	2.69	0.24
2	3.76	0.57	3.85	0.79	2.51	0.28
3	3.93	0.55	3.81	0.76	2.11	0.32
4	3.93	0.55	3.88	0.76	2.15	0.33

Other Sources of Data

Field notes were an important aspect of data collection in this case study. Appendix D provides the template for the field notes for this study. The field notes provided additional information about the organization of the mentors' relationships and networking with one another. These field notes recorded events documenting the mentors' activities with the mentees, many of which had not been planned as a part of the program. For example, the mentors organized weekly lunch meetings with the mentees as a full group. Additionally, mentors organized community service activities off-campus with the mentees on three different Saturdays during the length of the study. I was able to document observations of the overall setting of the mentors and mentees during their informal and formalized meeting times. Actual contents of the field notes included behavioral observations, descriptions, and comments related to the activities the mentors and mentees were engaged in.

Outcome data related to absenteeism and grades were gathered to assess if absenteeism was increasing, decreasing, or remaining the same once the students were involved in the peer mentoring program. Grade and academic performance data of the mentees informed the study

further in developing and guiding the mentors with their work with the mentees. Academic data were not used to directly influence individual practices of the peer mentoring relationships. The academic data were only used for the adults associated with the mentoring program to inform areas in which the mentees were generally performing to assist in the training and guidance of the mentors. Mentors were then able to consider how to use the peer mentoring time to develop positive prosocial school skills. Specific, personal academic data were not shared with the participants; however, I observed patterns and the behavioral specialist assisted in the development of the mentor contacts with the mentees. For example, bi-weekly checks in October showed that all of the mentees had not achieved a “C” grade or above on their Algebra 1 or Social Studies 1 chapter tests. This detailed information was not provided to the mentors; however, the mentors were told to check in with the mentees about their most recent chapter tests. As a group, guided by the behavior support specialist, the mentors brainstormed questions to ask the mentees about challenges and successes in their academics. This process assisted the mentors in guiding the mentoring activities in the peer mentoring class. The academic and attendance data were gathered from the attendance secretary at the high school on a bi-weekly basis.

Protections of Participants

In order to minimize access to sensitive information about the participants, I followed data minimization best practices and implemented access controls on all student-level information. In the consent forms, there was raw individual student data that required the use of a number of direct identifiers (typically student’s name, address, parents’ names, and other unique student ID number) to allow access to specific students’ records such as grade reports and attendance. The case study procedures restricted access to the raw individual student data that

contained those identifiers to the individuals participating. Then, direct identifiers of the participants were removed. This reduced the overall sensitivity of the file. However, participants' files still contained indirect identifiers (e.g., date of birth) and other identifying characteristics (e.g., gender), data on extracurricular activities program participation, and names of the student's teacher(s) that could be used to re-identify specific individuals. Consequently, these data are still protected by FERPA.

Coding Process Overview

In this section, I will explain the process of the coding of the transcribed interviews. This coding process began with pre-set codes derived initially from the Hemingway Survey-Short Version. From here, I recorded a set of codes that emerged from reading the transcribed interviews, and then to process of coding and analyzing the data through a repeated process. Next, I will discuss the system used to organize the codes and the systematic way used to categorize the data.

Creation of Pre-Set Codes

The data from the interview sources were coded and recoded, and they provided different perspectives for the themes that emerged. This data analysis consisted of examining, categorizing, tabulating, and recombining data obtained from the research. After each survey, I read and sorted student responses into categories placing similar responses in to the same category. These responses were placed on a large bulletin board for ease of use and saving. This allowed for the sorting of responses under appropriate headings. The large board also allowed me to easily organize and view the data. The qualitative data analysis involved coding processes. First, there was a creation of pre-set codes that were derived from the research questions, and then a list of the codes and their meaning was created. These codes were

originally derived from the categories from the Hemingway Measure of Adolescent Connectedness–Short Version. These initial codes included: school, teachers, peers, self-in-the-present, self-in-the-future, neighborhood, friends, and parents.

Emergent Categories

Another set of codes emerged from the reading, coding, and analyzing of the data. These emergent codes were the concepts, actions, relationships, and social meanings that arose from the data and were different from the pre-set codes. These codes required defining and explanation for clarity. I established a system to organize the codes and a systematic way to categorize the data in an attempt to make sense of the phenomena presented. Codes were organized both by descriptive codes and codes based on direct quotes. A collection process utilizing notecards and paper was the method of categorizing data initially.

Organizing and Verifying the Data

As coding continued, I began coding for various themes. These themes consisted of grouping the codes in larger categories of similar concept. As activities and interactions were observed, raw data were examined using a line-by-line analysis of the transcripts. Categories were developed and labeled. Next, patterns were noted, and as repeated comments occurred, they were grouped together. This continued until all comments had been categorized or excluded from final analysis. Once all the comments had been categorized or excluded, data saturation had been reached. Burmeister and Aitken (2012) explain that a researcher cannot assume data saturation has been reached just because the resources have been exhausted. Data saturation was reached because there were no new themes or categories to emerge, no new data, and no new coding (O'Reilly & Parker, 2012).

The primary goal of the initial stages of the coding procedure was to establish categories that could be used to describe the data and serve as a basis for the analysis of this study. The preliminary stage began with an intensive reading and study of all transcribed interviews and field notes. The outcome of this initial stage was a set of categories and a description of the data according to these categories. This stage of the analysis indicated similarities between the mentors in their expressions regarding their school connectedness and belonging, as well as types of activities they were involved in both at school and with their mentors. The data were compared to find the differences in how the mentors expressed their perceptions of school connectedness and belonging, development of self-efficacy and social capital, and engagement in the mentoring program. I wanted to discover whether the categories that had been identified in the studies reviewed by Karcher (2002, 2004) could help describe mentors' prosocial skills of school involvement, school connection, and social capital.

I engaged in a thorough reading of the transcripts and comparison of the first categories to the data in order to assess, reformulate the categories, or generate new categories from the data from each interview. Then, I returned to the data to assess whether or not my coding was accurate and precise. This process went on until no further categories could be formulated. Then, categories were described. If categories were clearly similar, they were combined. Here, a clear picture began to develop regarding school connectedness, social capital, self-efficacy, and thoughts about the caring of others by the mentors. I then repeated the same process of looking for any additional data or potential categories by specifically looking at each interview question and the data from each interview question with each mentor. The result of this procedure was a multi-category system with which the similarities and differences of the experiences of the mentors

could be described. The relationship between my categories and those from the Hemingway (i.e., the a priori categories) became clear when comparing the two categories.

All data were triangulated to strengthen the study and to gain an enhanced picture of the phenomena under investigation. I achieved triangulation by analyzing data from several data sources, including interviews, surveys, direct observations, and review of documents. Figure 4 represents the triangulation in this study. According to Creswell and Miller (2000), triangulation is a process of looking for “convergence among multiple and different sources of information to form themes or categories in a study” (p. 126). Triangulation of data about the experiences of both peer mentors and their mentees helped to confirm or disprove commonalities of experience.

Figure 1. Triangulation by Method

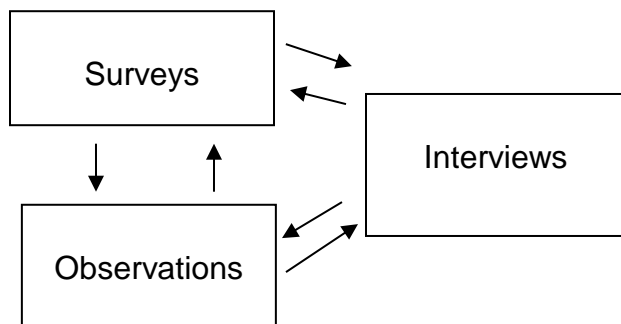


Figure 1: This simple path model, demonstrates the triangulation among the interviews, surveys, and observations in this study.

The initial stages of the coding procedure established categories that both described the data and served as a basis for the analysis of this study. The preliminary stage began with an intensive reading and study of all transcribed interviews and field notes. The outcome of this initial stage was a set of categories and a description of the data according to these categories. This stage of the reading of the data indicated similarities between the mentors in their expressions regarding their school connectedness and belonging, as well as types of activities they were involved in both at school and with their mentors.

ATLAS.ti Categories

The use of ATLAS.ti was to help uncover and systematically analyze phenomena within the unstructured data from the interviews. The ATLAS.ti program provided tools that allowed me to locate, code, and annotate findings in the primary data material, to weigh and evaluate their importance, and to create visual figures of the complex relations between them (Lewins & Silver, 2007). ATLAS.ti stores documents and keeps track of all notes, annotations, codes, and memos. ATLAS.ti is primarily used to break primary documents down into quotations, coding of these quotations, linking these codes in networks, navigating around this work using the ATLAS.ti tools and taking notes during this process (Kato & Rudes, 2008). One tool within ATLAS.ti offers the ability to create a co-occurring table reflecting the number of times that codes co-occur as well as the strength of the relationship between them. ATLAS.ti provides the ability to quantify some qualitative material by calculating the strength of this relationship. The relationship between co-occurring codes is observed by calculating the correlation coefficient. While ATLAS.ti is not the only method to calculate the correlation coefficient, it provides an excellent way to code and analyze qualitative material. For understanding, Taylor (1990) explained the correlation coefficient is a number that varies between -1 and $+1$, with 0 representing no relationship. The farther the number is from 0 , the stronger the relationship (Taylor, 1990). If the sign of the correlation coefficient is negative then there is a negative correlation (Taylor, 1990).

The transcripts of the semi-structured interviews were coded with the ATLAS.ti program following the manual coding. Campbell, Quincy, Osseman, and Pedersen (2013) applied ATLAS.ti within qualitative research analysis and provided an explanation of this coding procedure involving line-by-line coding from which concepts appear. The article offers

examples of coding the raw data, developing the initial codes, and then identifying the focused codes. This process was used with the ATLAS.ti program.

First, I removed questions and any responses that I had made as the primary researcher from the transcripts and only the responses of the mentors were preserved in the interview transcripts. Then each response was coded by the question number for easy reference. Once this was complete, the interview transcripts were uploaded into ATLAS.ti. Each transcript was uploaded separately as four different documents—Transcript 1, 2, 3, and 4. Then, each transcript was coded using open coding, in order to develop initial terms and categories. The a priori codes from the Hemingway Survey were not used as default codes for the initial coding when using the ATLAS.ti. Instead, the data were analyzed reviewing each line of the transcribed interviews using the constant comparative method (Glaser & Strauss, 1967) in ATLAS.ti to decide which codes fit the themes suggested by the data.

ATLAS.ti was used for assigning open codes going line by line through the mentors' responses throughout the interview transcripts. It was also used by including in vivo codes (mentors' exact quotes). All coding and in-vivo coding that occurred was completed without consulting previous coding materials to allow for an authentic response to the transcripts. Each code was compared to all other codes to identify similarities, differences, and patterns. Then, ATLAS.ti was used to create analytical charts based on analysis of codes and themes. The ATLAS.ti "families" option and search features helped identify axial codes through the passages identified by user-defined sets of codes representing concepts from the data that had some aspects that were comparable. Selective codes were essentially constructs created by connecting and consolidating second-level codes. After, this process, axial coding occurred and the initial codes were related one to another. For example, social capital/volunteerism and social capital

were considered and it was decided that these two codes should be combined. Finally, selective coding was applied and one code, time as a barrier, was eliminated because it was found that there was little significance to this code and no apparent connections or networks shown to them. The initial open coding table can be viewed as Figure 3 at the end of this document. Figure 4, also placed at the end of this document, reflects the results of the selective coding and the final codes that were used from ATLAS.ti.

The process of data analysis for the present study began with completing the transcripts of the recorded interviews. The finalized transcripts with only the mentors' responses were loaded into an ATLAS.ti file for coding. My next step was to re-read all of the transcripts for the purposes of identifying codes. The original ATLAS.ti coding process yielded a total of 19 codes and 269 in-vivo codes (i.e., direct quotations by mentors). These initial 19 codes were used to sort the data, determine which codes were most meaningful, and to decide which were not especially important toward answering the research questions. Using the first 19 codes, the data were categorized into six main themes that were used to address the research questions: social capital, servant leadership, self-in-present, self-in-future, school connection through activities, and belonging/sense of family. Each theme related to codes or families of codes that corresponded to in-vivo codes that showed the mentors' increases in prosocial skills of school involvement, school connection, and social capital. The movement from the original 19 codes to 10 final codes occurred during the data analysis. It was found that several of the codes were very similar in meaning and in re-reading the interview transcripts and field notes, I decided to combine some of the codes to eliminate redundancy.

Figure 4, as seen in the appendix, shows the number of co-occurrences between the final 10 codes: academic support, awareness of others, belonging/sense of family, fulfilling to help,

relationships, school connectedness through activities, self-in-present, self-in-future, servant leader, and social capital. This table also shows the intensity of those co-occurrences measured using the C-Coefficient, whose values fluctuate between 0 and 1. The highest co-occurrence between codes was between social capital and servant leadership at 41 with a coefficient of 0.33. Additionally, the table allows us to revisit in context the quotations in which two concepts are co-occurring. In this table, the co-efficient varies between 0.02 and 0.33. This table allowed me to examine the associations between concepts that were identified in the interviews. These associations provided clues about contextual factors and how these factors reveal associations between concepts, their intensity, their meanings, and their role in constructing the phenomenon I was studying. This table is relevant in that it shows the co-occurrences of the quotes found within the interviews and how they relate to the research questions. Each of tables of figures that reflect the relationships of the codes are found in the appendix at the end of this document. The highest co-occurrence between codes was between social capital and servant leadership at 41 with a coefficient of 0.33. This indicates a positive relationship between social capital and servant leadership since the coefficient is a positive number moving towards 1.0. It also means that in-common quotes reflecting the elements of social capital and servant leadership occurred 41 times during the mentors' statements across the four different interviews. Additionally, the table allows us to revisit in context the quotations in which two concepts are co-occurring. In this table, the co-efficient varies between 0.02 and 0.33. This table allowed me to examine the associations between concepts that were identified in the interviews. These associations provided clues about contextual factors and how these factors reveal associations between concepts, their intensity, their meanings, and their role in constructing the phenomenon I was studying. This table is relevant in that it shows the co-occurrences of the quotes found within the

interviews and how they relate to the research questions. Each of tables of figures that reflect the relationships of the codes are found in the appendix at the end of this document.

The code social capital had 106 quotes associated with it. These quotes represented a variety of concepts related to social capital. For example, activities, time spent together and feelings about the relationship are all information contained within the quotes associated with social capital. The co-occurring chart showed that social capital co-occurred with several other codes. Figure 5 represents the co-occurrence of social capital and servant leadership. Forty-one quotes demonstrated both of these categories. The types of relationships and assisting the mentees are identified in this category. For example, mentors' thoughts about how they felt they were contributing to their mentees, what their interpersonal strengths were and in what ways they could contribute to not only the mentees but the greater community are contained within the quotes associated in this category. Figure 6 represents the 22 in-vivo codes co-occurring in ATLAS.ti connecting school connection through activities and social capital. This figure narrows down the activities of social capital to the specific activities related to building school connectedness such as sports, leadership, campus related community service or involvement in clubs or activities. Twenty-two quotes demonstrated both categories. Figure 7 represents 16 in-vivo codes co-occurring in ATLAS.ti connecting belonging/sense of family and school connectedness through activities. Here the mentors expressed their own sense of belonging at the high school. Several students indicated that there was a sense of family at the school through relationships and activities on campus. This sense of family was directly related to school connectedness. Figure 8 represents the 14 in-vivo codes co-occurring in ATLAS.ti connecting relationships and servant leadership. The relationships that were discussed and identified in the interviews by the mentors were specifically those of the mentors and mentees as well as those

that the mentors had developed with the other mentors. The co-efficient for this co-occurring category was 0.33. Figure 9 represents the 26 in-vivo codes co-occurring in ATLAS.ti connecting social capital and awareness of others' needs. The co-efficient for this category was 0.19. Here, the mentors expressed how they developed an awareness of the needs of the mentees and offered friendships, advice, direction, and hope. In all, the figures represent the development of the aspects of the relationships among mentors and mentees that indicated an increase in the prosocial skills of belonging, feelings of fulfillment when helping others, awareness of others' needs, school connection leading to servant leadership, and social capital. The various quotes relay the mentors' perspectives of their experiences as a result of being involved in the peer mentoring. This impact show increases in the prosocial skills of belonging, feelings of fulfillment when helping others, awareness of others' needs, school connection leading to servant leadership, and social capital. With the quotes from the interviews occurring under different codes multiple times throughout the coding, it shows that these relationships are significant in this study. This is important in demonstrating the relationship between servant leadership and social capital.

It was notable for each of these categories that very few of the quotes were from the first or second set of transcribed interviews. Most of the quotes that corresponded with any of the co-occurring codes were from the third and fourth interviews, indicating an increase in the reporting in those categories over time.

Figure 2. Relationship Development

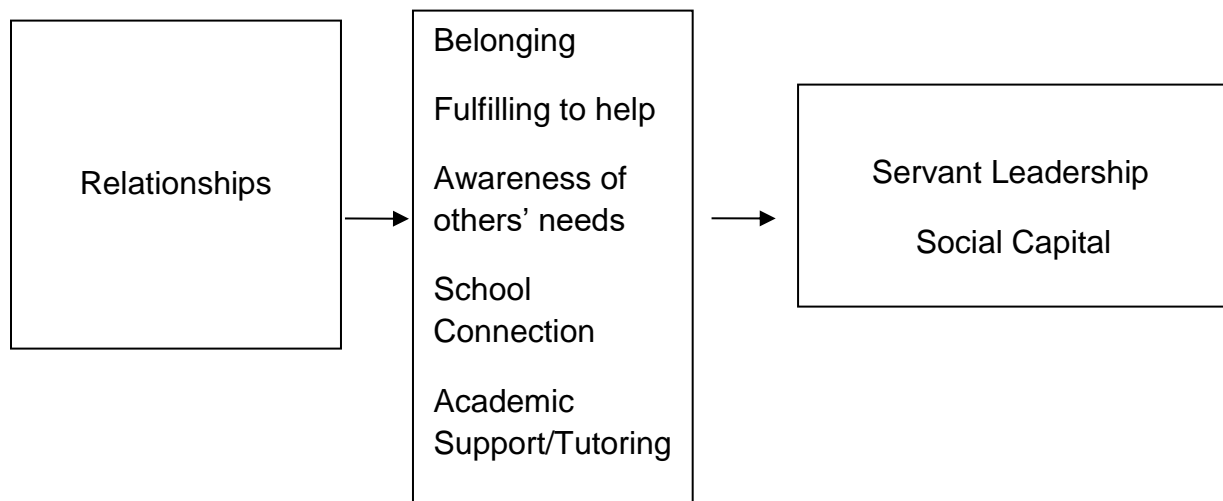


Figure 2: This simple path model, demonstrates the development of the relationships among mentors and mentees that brought about the prosocial skills of belonging, feelings of fulfillment when helping others, awareness of others’ needs and school connection leading to servant leadership and social capital.

Stage 1A: Mentors’ Responses

Stage 1A in the analysis consisted of a close examination of each category of mentors’ responses to interview questions. The responses of the seven mentors to each of the interview questions during each of the four interviews were compared and summarized, resulting in separate descriptions of the categories.

Stage 1B: Describing and Interpreting Mentors’ Experiences

In Stage B, similarities and differences in the mentors’ perception and experiences were compared. In doing so, patterns emerged in the mentors’ experiences, expressions, and statements that were later identified and described. The word pattern is used, in this instance, to refer to groups of associated statements that give insight (a) into the way in which mentors were establishing relationships with mentees, and (b) into the similarities and differences in the way in

which the mentors engaged or perceived personal school connectedness or school belonging. Furthermore, the patterns identified in the data identified into one of two clusters: first, one cluster concerned mentors' actual involvement in school activities as a part of connecting or belonging; second, another cluster fit into the actual feeling of school belonging or experiencing a sense of family.

Stage 2: Analyzing the Interviews

The purpose of the second step in the triangulation procedure was to develop deeper insights regarding the categories that developed from the interviews and field notes. The procedure followed an analysis of these data as described in this section. This procedure consisted of two main stages.

Based on the pattern of the descriptive data viewed in the interview transcripts, the categories related to peers and school connectedness appeared to increase as a result of participating in the mentoring program. This was inferred from the data as it was considered that volunteerism, specifically involving the mentees, was different in nature than those volunteer activities in which the mentors were previously involved. The data seem to support the inference that additional networking activities as a result of the peer mentoring program, such as planned lunches, school or social activities, and thoughts about future mentoring, were a results of involvement with the program. These activities would not have existed had the mentors not developed intentional relationships with the mentees and had developed a supportive mentoring network with the other mentors.

The category of peer relationships was divided into establishing relationships, that is, mentor/mentee relationships and mentor relationships based on the different types of peer relationships, identified specifically during this study. Establishing relationships was specific to

the mentors working towards establishing intentional relationships with the mentees. Mentor relationships referred to the relationships that mentors had with other mentors. The category academic support was expanded to academic support/tutoring. Tutoring allowed for acts of teaching or mentor-led instruction or intervention of academic material. Academic support allowed for assistance and encouragement for academic material. Both activities often occurred concurrently during the peer mentoring class period. Categories that concerned connectedness to the school through peers and activities such as sports, school leadership, and school-based volunteerism were categorized as connectedness through activities/peers. Many mentors indicated that they engaged in or signed up for such activities with, or because of friends or siblings. This category remained unchanged throughout the stages of analysis. Mentor's activities of volunteerism outside of the school and working with organizations in the community independently of the school district were categorized as community service/volunteer. New activities involving volunteerism or community service involving mentors after their involvement with the peer mentoring program were identified as new community service/volunteerism. Activities of community service/volunteerism with mentees were identified as community service/volunteerism. The category belongingness to school was reformulated into two categories: sense of belonging/family and sense of belonging/responsibility. Mentors clearly expressed two different perspectives of belonging in relation to this category. First, mentors expressed a sense of belonging that they had entering into the program as an established member of the school community. Secondly, the mentors expressed feelings of responsibility towards others that they experienced as older, wiser members of the school community able to assist younger, newer members entering the school community. The category of time was identified from later interview transcripts as mentors

indicated that they felt I was particularly interested in understanding whether mentors noticed changes in their relationships, school connectedness, self-esteem, and self-efficacy that were taking place during the mentoring program. In terms of school connectedness and relationship commitment, they expressed a desire to provide more time to mentees but schedules did not permit the amount of time needed or required to provide the assistance they felt was necessary. Another category identified, acts of helping and caring, from statements regarding wanting to help others, expressed ideas about assisting others both mentors and others throughout the community during the present and throughout life. Self-in-present/self-in-future combined categories from Karcher's (2002, 2004) categories were grouped together as the mentors spoke of their own sets of strengths in reference to the present and in relation to future goals and aspirations in a connected manner during the interviews.

Stage 2A: Describing the Content of the Categories

During this stage, the process of analyzing focused on in-depth analysis of each of the main categories. To be able to describe the range of the mentors' activities during the mentoring program, each category was considered for further assignment into subcategories. Using these subcategories gave more insight into the details of the mentors' activities in each category. With the use of the subcategories, the data could be described in more detail.

Stage 2B: Describing and Interpreting Mentors' Perspectives

Because I wanted to determine whether, and in what way, the subcategories were related to each other, the relationships between the subcategories were analyzed. Thus, the second main stage in the analysis procedure consisted of a close examination of the relationship between the subcategories. I identified patterns in mentors' prosocial skills of school involvement, school connection, and social capital. These patterns described the common features, as well as the

differences, found in the subcategories. The result of this second step was the description of two patterns observed from the data: mentors' relationships with mentees and mentors' relationships with other mentors. Here, summarizing the most important similarities and differences in the building of the mentoring program constructs was completed.

Stage 3: Combining Results of the Previous Steps

The procedure to combine the results of the two previous steps, as described above, consisted of two stages. The purpose of this step in the process of analysis was to synthesize the results of the analysis in order to gain a deeper level of insight into whether involvement in the mentoring program increased mentors' prosocial skills of school involvement, school connection, and social capital. It was here that the main themes emerged in relation to the specific research questions.

One of the types of triangulation identified was triangulation by method, which is also known as multimethod triangulation (Kopinak, 1999; Miles & Huberman, 1994). Kopinak (1999) indicated that the using multiple data methods provides for more detailed and multi-layered information about the phenomenon under study. Kopinak (1999) defined a multi-method triangulation as "gathering information pertaining to the same phenomenon through more than one method, primarily in order to determine if there is a convergence and hence, increased validity in research findings" (p. 171). This process was adopted for the present study.

In such a triangulation procedure, the way data are analyzed is of major importance. Data analysis can be approached in various ways. Triangulation in this study was not a matter of establishing whether analysis of the data from each of the methods would lead to the same results but, instead, the data from the methods were combined to develop a comprehensive view of the mentors' experiences of school connectedness, prosocial skills of school involvement, school

connection, and social capital. This converging evidence model (Yin 2014) was done by analyzing the data from the surveys, interviews and field notes to develop a clear view of the mentors' perspectives regarding their school connectedness, school involvement, school connection, and social capital. Each of these areas of data provided valuable information in constructing the perspectives as results of the mentors' involvement in the peer mentoring program.

First, data were collected from the mentors at different times throughout the study and with different methods (the surveys, during the interviews, and through observations of the mentors and mentees interacting together). This allowed the data to be triangulated by various data sources. Triangulation by method occurred through the interviews, observations of the mentors and mentees, and a comparison of the documents. The use of ATLAS.ti assisted in this process as it verified the patterns and comparisons of the data.

Results and Analysis

Four main themes emerged when addressing the research questions from the mentee interviews: (a) self in present and self in future, (b) volunteerism and social capital, (c) servant leadership, and (d) connectedness and school belonging. These themes represented how the mentors perceived their personal development as result of their participation in the mentoring relationship.

Research Question One: To what extent does peer mentoring increase the peer mentors' prosocial skills of school involvement, school connection, and social capital?

The research showed that involvement in the peer mentoring program increased the peer mentors' prosocial skills of school involvement, school connection, and social capital. One of the themes that emerged from the research data was that of connectedness and school belonging.

It was difficult to identify whether or not peer mentoring alone increased the peer mentors' school involvement. Most of the peer mentors were already involved in extra-curricular activities through a sport, student leadership, and/or National Honor Society (NHS). However, many of the mentors had tried new activities this school year with their mentees in an effort to introduce new school activities to the mentees. Additionally, the mentors worked together intentionally to involve themselves as a group in school and community activities with their mentees. My field notes document planning sessions during which mentors specifically planned out a schedule of events for the mentors and mentees. This schedule included a variety of events including community service, attendance at sporting events, participating in clubs or activities, and attending music and theater events. Many of these activities were those that the mentors had some experience with in the past and felt that the mentees would enjoy or benefit from in some way.

Mentor 101 expressed:

I am mostly involved in sports and leadership. These are things that help me feel connected to my school and community. These two areas overlap from the school into the whole area of [the town]. I am in Student Leadership this year. This is a new position for me. I hope my partner will try new things too . . . I feel very connected to my school. I have been involved in different activities for a while now but I always try something new every year.

Mentor 102 shared:

I was chosen to be in NHS. The community service I am able to do as a part of this really helps me feel like I am connected to the school. I also was chosen to be a part of leadership. I am involved in many different types of school activities through leadership.

I joined robotics and have a new group of people I am working with involved in this activity. These are all activities that build my sense of connection . . . This has helped me feel useful helpful and very connected.

Mentor 103 shared how peer mentoring increased his involvement and modeling of positive peer experiences:

I am now involved in sports and leadership. I decided to take leadership this year and I am sticking with it. There are new people I haven't worked with before. I have been playing sports since I was young and I really feel connected with the other people involved with this activity. Leadership and sports have put me into two different groups of people . . . Both these activities keep me very connected . . . that helps me feel like I'm part of a family.

Mentor 106 discussed how being involved in the mentoring process assisted in her connections at school:

I am involved in sports events planned leadership events. I became involved in these activities through my new friendships and mentoring. I have been working hard to branch out. I have realized that it is hard to do and I have to work at it. It is important though . . . The peer mentoring program has allowed for me to meet and recognize new people . . . These are things that add to my feeling of being connected to [my school].

Mentor 109 explained:

I am connected to my school and community . . . Basketball and theater are activities I started when I was young that help me feel connected. I am doing both right now so I am pretty connected with the students and staff involved in those. I just became involved in Rotary with my mentoring partner so I could help introduce a fun activity with other kids.

Mentors reported high levels of school connection through their experiences over the past two years at the high school. They identified various ways that they experienced school connectedness, including the peer mentoring program as one of the ways that they felt increased school connectedness. Mentor 102 expanded on this idea sharing:

It is important to me to be able to help someone who may be struggling. I think high school can be pivotal for a person and I may be able to encourage someone and help them move in a positive direction.

Increased social capital was identified as giving back, helping others, and building connected social relationships. These were all related by the mentors as positive impacts of the participating in the peer-to-peer mentoring program. Mentor 102 further explained:

I am involved in anything that positively unifies the student body. Ummm. I like to be involved in the student section of cheering for games and leading that. I also like to help plan both formal and informal events for the student body. I like getting people involved in community service activities too.

Mentor 106 also shared the importance of volunteerism and connection to the community:

I do tutoring when people ask me. I do lots of volunteer work in the community and with church. I just try to go to everything I can um . . . this is the key to connecting to school and community. Yeah. It's vital.

While research often indicates the importance of connectedness and school belonging by students who are at-risk, notable is that each mentor indicated the importance of school connectedness and belonging at school (Blum, 2005; Herrera et al., 2008; Karcher, 2004). Blum (2005) expressed the development of such relationships as a critical component of school connectedness, saying, "First, we must recognize that *people connect with people* before they connect with institutions" (p. 4). Mentor 101 shared, "For me it is the family concept we have

here. Everyone seems to have a sense of belonging through a sense of friends or things that they enjoy.” For the mentors, involvement in sports, leadership activities, and outside volunteer activities were of primary importance to feeling connected to their school.

Mentor 102 explained his activities at school by sharing:

I'm in leadership and I help out with whatever school functions we coordinate at the school. I am in baseball and when I am not in baseball. I help coordinate the student sections and I really enjoy that and trying to bring people to get together through that activity.

Newman, Lohman, and Newman (2007) explain that the concept of belonging at school is linked to the peer group through three key components: affiliation with a group, the importance that youth attach to being part of a group, and the fact of being acknowledged within the group and feeling pride as a result. Mentor 101 also shared:

I like the idea of helping others. I feel like the peer mentor program could help create more friends, and more friendships throughout the school with people who haven't been friends before.

Mentor 109 shared:

It has changed my view on my peers. I am no longer afraid of approaching others outside my friend group. I know that I can reach out and be of assistance. I can be a part of building and maintaining relationships.

Many of the volunteer activities in the larger community were either set up through organized groups from school or coordinated with peers from school. These were also the primary activities in which mentors indicated having developed their primary friendships and sought to involve mentees so that they, too, could develop peer friendships at the high school. The cross-

age peer mentoring activities allowed mentors to serve as peer counselors, pairing more experienced student with less experienced students and potentially increasing mentors' own feelings of school connection. Mentors expressed a need to assist their mentees and a strong desire to be present and available to help. Mentor 102 shared, "I really want to make underclassmen feel more sure of themselves. Yeah, I really want to keep the student section going and building that sense of belonging at the school." Additionally, the mentors spoke of being able to teach incoming students how to connect to the school and build important connections and a sense of belonging. Mentor 108 elaborated, "I've been told I'm a pretty good teacher like I tutor sometimes and every time and if someone says I need help with this class, then they know to come to me."

As mentioned in the literature, social capital is the value derived from membership in social groups, social networks or institutions (Jensen & Jetten, 2015). This membership gives individuals access to resources and collective understanding. Putnam (2000) described different forms of social capital, whereby social capital can be derived from shared experience, cultural norms, or shared purposes. The shared purpose in the mentoring program was to assist the incoming students in connecting with the school and building a sense of belonging and success. As discussed in Chapter 2, Coleman believed that increasing social capital in the school, by strengthening the social relationships between parents, teachers, and students, would increase overall personal awareness and achievement in students (Coleman, 1990). Additionally, Coleman also noted the importance of student involvement in the school to increase personal awareness and further enhance relationships with other students (Coleman, 1990). Coleman also discussed the importance of being actively involved in each other's lives and establishing trustful and helpful relations (Coleman, 1990).

Mentor 102 explained the importance of relationship development in the mentor process:

I really enjoyed bringing people in and making them feel more comfortable. I want to help freshman feel more comfortable and feel a sense of belonging before they go through troubling times . . . I really want to make underclassmen feel more sure of themselves. Yeah, I really want to keep the student section going and building that sense of belonging in the school.

Mentor 109 continued by explaining:

I have been mostly focused on helping my partner create and execute a plan for success in high school. I cannot be the one who creates it . . . I can reach out and be of help to peers. I am glad that I can be a part of building and maintaining relationships that will be helpful down the road.

Mentors also discussed the involvement in the program as being an important component becoming involved in new activities as well as engaging in prosocial and student activities that engage in social capital. Mentor 103 shared:

We also work on organization and share upcoming events. My partner has not been very interested in extracurricular activities so I have been trying to share the value long term of these types of activities.

Finally, Mentor 102 summed up the ideas of social capital and connectedness stating:

Life can be really hard for a freshman . . . uhm, (laughs) it can be hard for everyone, actually. My job [as a mentor] is to make easier and improve the odds. The relationships are the most important thing I think. My success was because of good people who cared. Now it's my turn.

These examples, imply that social capital is not fixed and new social capital was formed while the students were engaged in the mentoring program. It was unclear whether social capital that was formed during the mentoring program affected identify development.

As previously discussed, Coleman (1994) described social capital as the exploration of the nature of social structures. He argued that social capital was defined by its function. “It is not a single entity, but a variety of different entities, having two characteristics in common: they all consist of some aspect of a social structure, and they facilitate certain actions of individuals who are within the structure’ (Coleman, 1994, p. 302). The mentoring relationships exhibited an example of such a social structure and the facilitation of the actions within the structure. The mentoring relationships were built in the social structure of the mentors leading the mentees in prosocial academic and social high school activities that were facilitated within the framework of the classroom. Then, expanded into more spontaneous adolescent relationships involving extracurricular activities such as lunch time gatherings, community service activities and sporting event attendance.

Research Question Two: Do mentors report identifiable differences between matches that are same gender or different gender, or differences between age differences and different gender? If they do, what are the reported differences? If they do not, what are the reasons for the lack of reportable differences?

Mentors did not directly or formally report either through the surveys or interviews identifiable differences between matches that were same gender or different gender, or differences between age differences and different gender. Female to female mentoring matches were more detailed in describing their relationship development and activities than they were involved in than the male-to-male or male-to-female or female-to-male relationship matches.

Findings of this study are inconclusive regarding identifiable differences between matches that were same gender or different gender, or differences between age differences and different gender. It does report, along with the literature, that females are more concerned with their feelings about relationships.

As mentioned in Chapter 3, Carol Gilligan (1987) noted differences between males and females in their feelings towards caring, relationships, and connections with others. Gilligan and her colleagues have conducted intensive interviews with adolescents from 6 to 18 years of age and reported that girls consistently reveal detailed knowledge about relationships. “They sensitively pick up different rhythms in relationship and often are able to follow the pathways of feelings” (Kalsoom, Behlol, Kayani, Kaini, 2012, p. 19) While all mentors were actively involved in the mentoring program, females were more articulate about their relationships than were the male mentor participants. The female to female mentors were more detailed and conversant about their relationship matches. Mentor 108, a female matched to a female mentee stated:

We have lunch a couple times a week. I took my partner to dinner. It was not difficult to keep conversation going and I was glad that we went because it was appreciated and I know this was a special outing for my partner. We also have plans to go to a basketball game. We have been to other activities with the rest of the group in the program too. We continue to work on schoolwork on almost a daily basis.

Mentor 107, a female matched to a female mentee shared, “We are also doing little things to get to know each other you know like talking and texting. We also Snapchat stuff about our day.”

Mentor 107 further stated:

My partner and I are close. We talk about much more than school work. I would say that I am more than just her mentor. I am her friend but my role has become like an older sister. I am a listener but also I can offer guidance and advice. I also get a lot from our relationship because I feel that I am needed. I know that I have an important role in her life that no one else can fill quite like I can.

Mentor 108 shared similar thoughts, “We even work on schoolwork in the evenings but we take time to relax too. We have watched some Netflix and talked in between working.”

Mentor 109, a female mentor with a female mentee also shared:

I have been mostly focused on helping my partner create and execute a plan for success in high school. I cannot be the one who creates it so we have gone through all subjects and decided what things to work on. We also have been figuring out what activities to focus on. We have had lunch together a couple times a week. We have gone to a movie and to the retirement home to help out there too.

While the other gender matches appeared positive, based on observations as well as through interview analysis, the mentors were not as articulate in describing their activities or quality of the relationship.

Mentor 101 a male mentor with a male mentee shared this, “We joke and have a great time together,” to explain his relationship with his mentee.

Mentor 103 explained his relationship with his mentee this way: “Um, I think it is really good. Um we talk about things. We like . . . have stuff outside of school we like as well so we have really connected.” Mentor 106, a female mentor with a male mentee shared the following when discussing the quality of her peer mentoring relationship, “Supportive and friendly. I work at it. I, um, feel good about things. I am friendly with my peer mentoring partner.”

Holmes' (2007) study described both positive and negative experiences with same-race and same-gender mentors, as well as mentors from different backgrounds. The most important factor was the mentor's commitment to the mentee's success, regardless of race or gender.

Additionally, some research finds no significant differences among genders in career mentoring or psychosocial support when comparing homogenous mentoring pairs (same gender and race) and diversified gender pairings (Smith, 2001). In this study, mentors demonstrated a commitment to their mentees success. Gender did not appear to be a factor.

Cohen and Light's (2000) theory that successful mentoring relationships are often reported as those where mentees felt they shared their mentors' personal values. Gender or age of mentoring matches was not a key focus on this theory. In the design of the peer mentoring program, there was a fairly open-ended structure for the students to follow. The mentors in the program began their mentoring and coaching by asking the mentees about themselves and referred to a few guidelines provided by the program organizers but were encouraged to develop natural relationships. The guidelines provided for discussion regarding the mentees' strengths and weaknesses as well as what they felt they needed to advance to have positive high school experiences. While the mentors did not specifically indicate more or less satisfaction with their mentoring partners through the surveys or interviews, the mentoring matches that were female-to-female or female-to-male appeared to report in the interviews more involved and connected relationships than those of the other relationship configurations. This is not to say that there were not positive relationships matches. Instead, the data from interviews and surveys simply did not provide details about the other matches that would allow for a conclusion. What emerged in lieu of a focus on gender and age configuration was a focus on helping all of the

students whether or not their specific mentee was male or female. Mentor 101, a female matched to a male mentee, stated:

We have hung out at school in between classes, had lunch and I have been helping him on social studies classes. During out of class times, we pretty much walk around the halls with my friends and I introduce him and we talk about music and sports.

Mentor 102, a male matched to a male mentee stated, “We have been working on homework mostly. We also talk about what is going on at home. I am a sounding board. Sometimes I just listen.”

All of these mentors shared positive connections with their mentees regardless of gender or age matches. None of the mentees specifically identified their relationship quality in terms of gender in regards to the quality of the match.

Observational data, as detailed in the field notes, provided data regarding the mentors’ activities. The mentors intentionally organized events with the mentees as a group outside of the one-on-one relationships without regard for gender. Program parameters were set so that the mentoring could occur within the classroom during a specific class period of the high school schedule. It was assumed that mentors and mentees would engage in one-on-one activities outside of class approximately twice a month. However, within one month of the program, an unanticipated development began to occur. The mentors combined forces in mentoring their mentees, and mentors began assisting one another. Observational data documented mentors’ discussions, without adult direction, how to organize the 90-minute class periods. Listing on the classroom whiteboard priorities for the time was allowing for 45 minutes of academic support time. During this time the mentors identified who among the mentors were strong in various freshman level subject matters. After this, the mentors made triangular folded table-top tents to

place on the tables. From this point on, the mentors set up the tents on the classroom tables entitled: English, Spanish 1, World Studies, Biology, Algebra and Electives, and one mentor sat at each table available to work with any mentee, not just his or her assigned mentee. One mentor of the seven floated around the room providing additional academic support, sharing physical materials, or assisting with problem solving by talking with mentees and mentors. In this activity, the mentoring assumed the role of tutoring; however, tutoring was not the only activity that the mentors were engaged in with their mentees. While the mentors had specific mentees matched to them, they created a plan not only to work together but also to serve all mentees.

Mentor 109 explained:

It has gotten me better with how to explain things to them when I'm helping them with their schoolwork ...because originally the plan was to be with a partner, but it's more of moving around and talking to whichever student that needs help at the time.

In the academic support activity, the mentoring assumed the role of tutoring; however, tutoring was not the only activity that the mentors were engaged in with their mentees. Mentors also organized weekly lunches with their mentees. The mentors shared with the mentees that they would be meeting on Wednesdays at a table in the Commons by the Clock Tower for lunch. Mentors organized themselves and signed up for various snack items to bring to share to these lunch times. The mentors, themselves, identified that these lunches were social and so that the entire group could get to know each other better. This was not required by the program and was an activity that the mentors created, planned, and executed without adult guidance. Due to this unanticipated program organization initiated by mentors, I was unable to discover specific data to address the question related to reportable differences in gender matches.

Research Sub-Question A: What is the impact or effect of mentoring on the youth mentor?

The youth mentors in this study shared that becoming a peer-to-peer mentor was an experience that assisted them in becoming more connected to the high school campus and positively shaped their own leadership skills. Early in the study, Mentor 101 expressed, “I feel like I am not only starting an important friendship but truly helping someone whose life will be impacted longer term for the good.” Mentors shared that opportunities for increased student leadership and volunteerism as ways in which they were impacted and ways in which they had experienced an increased connection to students and community members. Mentor 102 stated:

I just recently became involved in student leadership. I have been able to get involved in volunteering for many extra activities both on campus and off campus. I am enjoying different activities with students and community members. This has really helped me feel connected and useful.

Mentor 106 further discussed the following: “The peer mentoring program has allowed for me to meet and recognize new people. I feel like I get to teach and lead and these are activities I enjoy doing.” Understanding the needs of others and building relationships was one way in which mentors were impacted by the relationships. Mentor 107 explained:

I feel like I have helped people and have made them feel important here ... drawing people in and giving them a place. Um, I guess, what I mean is we are all this together and someone has to take that step to make a spot for everyone else. Not that I can make a spot for everyone but I can plant some seeds and then next person can add and so on. I think we all have to do this.

Several of the mentors discussed their leadership in terms of encouraging their mentees. Mentor 101 shared:

I am in Student Leadership this year. I feel like this activity is more meaningful since I am working with a younger student. I feel like I am volunteering for more because of her. I am also more aware of other students in the sports I am in and what their stories might be. I want to get younger students involved and really reach out to more kids.

Mentee 108 stated: “My job is to help her realize her own potential and help her pick up the skills she needs to succeed.” Additionally, mentors identified greater self-confidence, strong communication skills and a deeper commitment to helping others in the future. Mentor 102 expressed: “Over time, I can work with lots of high schools and kids and spread this to many places, helping many students.” Other mentors shared similar thoughts about helping others. Mentor 103 stated, “I will always be involved in working with community to programs to help others.” Mentors expressed that they experienced satisfaction from knowing that they helped younger peers develop understandings about the routines and expectations of high school, as well as developing a sense of connection to the high school. Mentor 108 shared, “I truly and deeply care about those who may not have had the chances to be as successful as maybe some of the other kids who are out there. I want everyone to have a chance. I think this is a strength of mine.” Mentors also reported that mentees learned basic social and academic skills. Mentor 109 explained:

I have been mostly focused on helping my partner create and execute a plan for success in high school. I cannot be the one who creates it so we have gone through all subjects and decided what things to work on. We have also been figuring out what activities to focus on.

Mentors shared that they believed that their relationships with mentees helped the mentees improve in their academic work, social behaviors with other peers, communications with

teachers, and develop interest in the school and community that they otherwise would not have had. Mentor 101 explained:

We have had our in-class meetings and have had lunch together with the entire group once a week. We got together for the community canned food drive with the peer mentors a couple Saturdays ago.

Mentor 102 further explained:

I would like to be able to have a stronger relationship and feel like I could make more of a difference. I do not know if the homework support is enough. I don't see my partner connecting the school or community and it worries me. The program impacts me because it matters to me and I see it as important for all incoming 9th graders.

Mentors felt that their encouraging and supportive relationships provided support, guidance and friendship to students who really needed them. As Mentor 101 stated: "I feel like I am truly helping someone whose life will be impacted long term for the good."

Additionally, mentors developed a sense of support and interest in helping each other and developing effective listening skills both with each other and with their mentees. Mentors exhibited a genuine commitment to helping their peers, both mentors and mentees, and demonstrated empathy and a desire to improve the life of someone else. Mentor 101 expressed the following:

I feel like I am helping others but I feel like my partner needs more of my time both in and out of school. My partner has other needs and when I think about it, I had them as a freshman too. I think that I had better outlets than my partner does. Not everyone has these supports. This has really shown me how important a program like this is and how

as much as kids are the same, they all have different stories. I have realized high school is more than what goes on during the day in classes.

Mentor 109 stated:

I never really thought of school as being hard. Either academically or socially. I have been lucky so being able to help and explain things thoroughly is a great feeling ... I have already seen a change for the better.

Another one of the benefits that mentors expressed was that of the being exposed to new ideas about the world. Mentors shared that they started gathering ideas about their future involvement in community service and building relationships and social capital. Mentor 102 explained:

I know that I want to stay involved in this program and keep working with similar programs throughout my life. There is incredible value in this work ... The program impacts me because it matters to me and I see it as important for all incoming 9th graders.

Mentor 109 shared, "I see myself as being able to help others. I can use this in many ways in the future to help people." Mentor 101 shared these thoughts about the program, "I feel like I am truly helping someone whose life will be impacted long term for the good." Mentor 102 further expressed it this way: "Now, I can see a big picture. I understand that things can be improved and refined to come up with something amazing. I can see that one small gesture can snowball into something amazing."

Research Sub-Question B: What effect does the quality of training of mentors prior to the mentorship match have on the mentoring relationship?

Data from the observations and interviews with peer mentors provided some insight into their perceptions of the training that they received. The review of previous research indicated

that the more training and support that peer mentors receive, the more they will be equipped for successful relationships and experiences with their mentees (Foster, 2001; Heirdsfield, Nelson, Tills, Cheeseman, Derrington, Walker, & Walsh, 2008). Mentors were provided a series of trainings in preparation of their mentoring. The first training was conducted by the behavior support specialist and primary research for the purpose of preparing the mentors in working with the mentees. Activities in these sessions included how to provide academic support and tutoring, training student how to use a planner, how to share school activities and clubs, involving students in school activities and clubs, when to involve adults in concerning situations and different types of prosocial activities during mentoring class. During the trainings, mentors and the key adults—behavior support specialist, primary researcher, county mental health counselor and leadership advisor—facilitated conversations and assisted peer mentors in developing a short list of duties for peer mentors, including how to positively build rapport with the mentees, how to positively communicate with mentees and how to build academic and social success in freshman students. The document was a short list of the duties of peer mentors, including suggestions about how to build rapport with mentees, how to communicate with mentees, the paperwork peer mentors should use to document their work, and the duties of peer mentors as they help mentees to plan and practice their lessons. Part of this training was intended to develop mentor confidence and self-esteem in working with the mentees. Setting personal goals and modeling this for the mentees was an important part of the initial trainings.

Each of the mentors expressed an interest in the implementation of a new program that would assist freshman students during the transition into high school. Mentor 102 explained, “I really enjoyed bringing people in and making them feel more comfortable. I want to help freshman feel more comfortable and feel sense of belonging before they go through troubling

times.” Mentor 101 stated, “I feel like I am helping others but I feel like my partner needs more of my time both in and out of school. I have realized high school is more than what goes on during the day in classes.” During the weekly mentor debrief sessions, the mentors discussed how to best support the mentors and often mentioned the needs of the mentees that surpassed transitioning into ninth grade.

The mentors expressed an interest in the mentorship program out of desire to assist the incoming freshman. Mentor 102 continued, “. . . it is fun and fulfilling to help others. Sometimes I do not know how to best help because I think these students needed assistance many years ago long before high school.” Mentor 103 explained relying on the guidance of the other mentors [friends] and trainings:

My friends have a lot of school spirit so that really helped me because I am a quiet person . . . It is a stretch for me because I am quieter. But it is good for me to be stretched and I am lucky I have friends who draw me in.

Reviewing the academic transcripts, none of the mentors needed the elective credit or grade associated with the course; therefore, the mentors joined the program with the intent to serve the mentees and provide leadership to these students as they entered the high school setting as a function of service and care. The training sessions that were planned and executed addressed many of the typical transition issues as well the issues that Mentor 103 shared:

I think the whole idea of the program is great for the younger students. I would like more time during the school day with my partner because I think my partner struggles throughout the day in class and out of class. I am not always there and I find myself worrying during the day. I wish that there were a way to fix this for the students who are really in need during the day. I do like the aspects of helping others.

Discussions surrounding how to support independency in the mentees and developing an awareness in the mentors that they were not responsible for “fixing” every problem for their mentee was an area in which training and support for mentors was provided.

The category and theme of the *self in present and self in future* related to the idea of mentor training and the effect on the mentoring relationship. Here, the mentors were able to talk about their personal strengths and how they felt they were able to utilize their strengths in their current daily lives. Identifying strengths demonstrated the mentors’ self-efficacy and self-esteem. Early in the study the mentors were not as certain about identifying their strengths. Mentor 109 stated, “That’s a really hard question. I can’t answer.” By the end of the study, the mentors were very clear about their strengths. Mentor 103 conveyed, “I’m patient and I can explain things to kids. I think this is important to helping others.” Mentor 108 indicated her strengths in the final interview as:

. . . studious habits, I’m a pretty good listener. I’ve been told I’m a pretty good teacher, like, I tutor sometimes, and, every time, and if someone says I need help with this class, then they know to come to me. I’m pretty artistic.

How the mentors reflected and considered their own potential and the types of careers and activities that they considered themselves capable of pursuing became more detailed throughout the study. Mentor 102 expressed in one of the last interviews during the study, “I want to go college and major in psychology and see what bothers people and how we can get through it.” Mentor 101 discussed long term plans sharing their connection to mentoring, “I plan on helping people with PTSD and matching them with animals who may have been abandoned or abused to form a partnership that will heal them both. I think mentoring is somewhat similar.”

The recognition of their strengths, their focus towards the future, and the feelings of social confidence play a significant role in the mentors hopes and belief in their sense of who they are as individuals currently and their hopes and aspirations for their future. Mentor 107 shared her aspirations by stating:

I hope that I can provide comfort and encouragement. I ultimately want to help people and be a better person than I used to be. I want to consistently be bettering myself and the community in which I live and work.

In a final interview, the same mentor shared both her strengths and her aspirations for her future:

I relate well to others and have a sense of compassion for others that I don't know that I ever had before. I was pretty self-centered and maybe not even a very good person. My qualities and strength is that I know that I can change and can help others see that they can change and grow and make the world that they live in better. Little changes make big changes. I still want to be a labor and delivery nurse. I feel that I can be compassionate to others during a time that can be uncertain and stressful. I also feel that I can use those skills in positive ways in the community in which I live.

Mentor 104 shared how her thoughts and understandings changed throughout the program:

I guess it helped because I like don't really think about how it was when I was younger coming to a new school so it kind of puts perspective on things like they are new kids and they are scared and it's not like I can just do everything I want to so that kind of helps me think about that.

Mentor 103 expanded:

I pretty much, perspective, like going into a new place or when I go to college next year I can take what I've learned like, ok, some of these scared and don't want to get involved

and it hurt them and knowing that I can be like, ok, I need to get out of my bubble and get involved because if not, it wouldn't be a good experience for me and I want it to be all that I can get.

Research Sub-Question C: Why is it important to support and provide ongoing training for peer mentors?

Subsequent trainings after the initial month were informal. These trainings were discussion and problem-solving based on input from the mentors and adult facilitators and led to a theme that emerged regarding volunteerism and social capital. The sessions were intended to focus on providing support and information to mentors as they had questions or needs as they arose. Mentors shared that felt more relationship development training would be helpful for future mentors. Mentor 101 expressed during an informal conversation with me, "The more I work with the students, the more I realize the need."

Mentor 109 shared:

I can do anything I want to and there are lots of things I would like to do. I am still just a kid. When I am older . . . I will have more power over how I organize my time and the impact I will be able to make. I know I can reach out and be of assistance. We are working on all of those skills right now.

These statements express the mentors' understandings and awareness of the mentees' needs and their potential limitations at being able to meet those needs. By providing on-going support and training, mentors are better equipped to assist and encourage the progress of the mentees.

Such support and ongoing training for peer mentors was necessary as the high school peer mentors were adolescents and students themselves with only two more years of experience in the high school setting with academics and social experiences. Peer mentors required

explanation and training by mentor program advisors about how to best work with their mentees and how to set achievable goals within their mentoring relationship. These activities assisted in the development of the mentors' engagement in volunteerism and social capital. Volunteer activities such as mentoring develop connections with people who might otherwise not have developed a relationship or contact with one another. Ongoing training assists with the support of these positive connections. Additionally, mentors asked for phrases to use when mentees have the need to advocate for themselves in peer settings throughout the school in academic and social settings or during peer social conflicts with other peers outside of the program. Mentor 101 explained:

The [mentor] meetings we have help a lot. I am in Student Leadership this year. I feel like this activity is more meaningful since I am working with a younger student. I feel like I am volunteering for more because of her. I am also more aware of other students in the sports I am in and what their stories might be. I want to get younger students involved and really reach out to more kids . . . I like to think it is bringing people together in a sense of camaraderie.

Mentor 107 shared the following thoughts about the program:

It has helped me mature a lot because I am their role model. I don't want them to go own the wrong path. I need to make sure I am responsible and a good role model . . . [this] actually is improving my own self-esteem. I know that I am helping . . . I have learned to be patient and a good listener. I also am learning about the different stories people have in their lives. It made me realize that my mentoring partner has a life story too that I may not know about.

Such statements show that mentors are aware of the needs of the mentees and have some skills in

working with the students but may not be equipped to know how to involve the younger students in activities or how to reach out to other young students. Additionally, mentors also shared that the trainings helped them understand the needs of the mentees. It was through these understandings that the mentors created a teamwork approach in working with the mentees to best provide support and guidance. Mentor 103 explained:

These students need the support of several peers and adults. We have figured out a way to work together so that the students are able to work with several peers who can care about them and encourage them. We, mentors, work as a team. We didn't talk about it, we just started doing it. I think it is who we are. Um, for me, I like helping others and giving back. I get to do that in this program . . . I'm patient and I can explain things to kids. I think this is important to helping others.

The mentoring activities of this program were centered on the development of social networks, developing specific future goals, and a reliance on information and resources. Through the weekly mentor training/support meetings with staff, mentors discussed developing teaching and advising skills as they worked with and tutored their mentees. During one interview, Mentor 106 shared that the training and mentoring “helps me teaching wise with interacting kids younger than me. This is really key to my future. It helps me give back to others who are in need of guidance and friendship.”

Others spoke of how they worked with other mentors as they worked with the mentees to manage projects and work in teams to promote positive relationships and school connectedness. Mentor 103 explained that the mentors were “able to work with other students in the program on their academic work. This is really great for the students because they can get the best out of us mentors.” Mentors shared that these activities helped them with their own communication skills

and social capital skills such as understanding their peers better, motivating their peers, and the development of better problem solving skills. The mentors spent time working on, not only the individual partner relationships but also relationships with the other mentees, through various activities. This structure was developed through the ongoing trainings. The mentors' relationships with each other was important to the overall success of the mentee partnerships.

Mentor 102 explained:

It is a good relationship because we can work as a partner team but we also work in the full mentoring group and are accomplishing good things in the class. We are also doing service and getting involved in campus activities. This is positive because we didn't even know each other before.

The mentoring program offered a new social network to the mentors and inspired them to expand the idea of assisting other students with similar needs. Mentor 101 explained, "I feel like it could help a lot of people. I just wish it were bigger and allowed for the help for more students. This is a really important for the kids in our school." Volunteering, in the form of peer mentoring, be viewed as a form of social capital, as it promotes prosocial behaviors and school connectedness, assists marginalized social groups at the high school, assists in community building and enhances the social network between students and community members. In a final interview, Mentor 102 stated, "I know that I want to stay involved in this program and keep working with similar programs throughout my life. There is incredible value in this work." Mentor comments are consistent with the literature (Dotterer & Lowe, 2011; Durlak, Weissberg, Dymnicki, Taylor, & Schellinger, 2011) which highlights that participating in volunteer activities contributes to stimulating a sense of belonging to a social network. Ongoing training is key to the success of such mentoring programs.

Chapter 4 Summary of the Findings

Chapter 4 presented the research questions that guided this qualitative case study. It also presented the data gathered during the process of conducting semi-structured interviews with seven high school juniors in mentor roles at the high school. From the gathered data, four themes emerged: (a) self in present and self in future, (b) volunteerism and social capital, (c) servant leadership, and (d) connectedness and school belonging. I was able to use these themes to explain the overall increases in social capital, prosocial skill development and school connectedness the mentors experienced as a result of being involved in the peer-to-peer mentoring program. Findings illustrated the connections between various codes which in turn lead to the development of overarching themes related to the five research questions. Aspects of the mentoring relationships that held meaning for the participants were identified and an enhanced understanding of the qualities of the mentoring relationships in relationship to the research questions were identified. It was discovered that in this particular study that peer mentors self-reported increases in their prosocial skills of school involvement, school connection, and social capital. Mentors did not formally report differences between peer mentoring matches that were of the same gender or different gender. However, female mentors who were matched to female mentees were more detailed, in that they spoke longer and were more specific in describing the activities they were involved in with their mentor counterparts, in their conversations during the interviews about their relationships and activities than other gender combination mentoring matches. Peer mentors in this study reported that the mentoring created opportunities for them to build school connectedness and positive leaderships skills. Mentors reported that they joined the program with the hope of assisting the mentees and providing support to these students as they transitioned to the high school. Quality of training

can only be assumed to have assisted in the positive relationship outcomes since these trainings were not compared with other types of trainings provided to mentors in similar programs.

Finally, mentors self-reported questions or concerns about the mentees throughout the program that program facilitators were able to address as they occurred. Since high school students only have a certain amount of life experience, ongoing training and support is necessary to assist them in navigating the mentoring of another youth. Additionally, access to competent, trained adults is necessary in the event of a more complicated or serious academic or relationship issue that the youth may find themselves unable to navigate independently.

In Chapter 5, I will discuss the findings relating to previous research and conceptual frameworks of the study, suggest practical implications, and identify additional research needed in the future.

Chapter 5: Discussion and Conclusion

Introduction to Chapter 5

The first chapter of this study introduced the background, purpose and significance of the study. The second chapter presented a review of relevant literature, including different types of mentoring programs utilized in educational settings with specific attention given to what constitutes a peer-to-peer mentoring program. The third chapter outlined the methodology of the study, including the sampling procedures, instrumentation used, and the data collection and data analysis procedures. The fourth chapter presented the results of the study and included the data analysis of descriptive statistics and interviews with the mentors. This chapter presents a brief overview of the problem, purpose, research questions, methodology, and major findings of the study. The primary focus of this chapter is to present findings related to relevant literature on peer-to-peer mentoring programs and social capital and school connectedness, implications for action, and recommendations for future research are addressed.

Mentoring relationships have long been utilized to provide a framework, in which either formal or informal relationships are structured so that one individual supports, encourages, and advises another. Although the type, format, purpose, length, and nature of the type of relationship may vary, mentoring can be found in the literature from many disciplines: art, music, business, community service, education, and science. In the field of education, mentors have been used to support beginning teachers, college freshmen, gifted students, at-risk students, and special needs students. Mentoring in the United States has been documented over the past two hundred years in a variety of structures and organizations. In the review of the literature it was discovered that during the mid-to-late 1800s, charitable societies developed in many cities during the friendly visiting movement, as an effort to establish uplifting, mentoring relationships

between middle class volunteers and poor Americans (Freedman, 2008). During the past two decades, mentoring of youth specifically in the school setting has given rise to a variety of different types of programs promoting the success of adolescents. Herrera (1999) suggested at that time, that “school-based mentoring is one of the most promising and rapidly expanding of these approaches” (p. 1). Within the school based high school setting, one of the ways that peer-to-peer mentoring relationships may be utilized is to allow for more experienced youth to provide support and guidance to less experienced youth as they transition into the school based high school setting.

Throughout the literature it has been documented that both adults and cross-age peers have been successfully paired with youth as mentors. While adult mentors are most frequently used as mentors for adolescents in the high school setting, peers are more likely to engage with other peers (Garringer & MacRae, 2008; Karcher, 2005b). Peer mentoring programs, capitalize on adolescents’ increasing interest in peer relationships as they enter the teenage years. Garringer and MacRae (2008) point out that mentees’ tendency to look up to a slightly older peer indicates that they view their mentor as a role model and value what they have to offer. Hartup and Abecassis (2002), Harris (1998), and Rowe (1994) have claimed that peer groups have a stronger influence than that of parents. As adolescents seek to become independent, they often spend more time around peers and can be positively influenced by strong peer models. Karcher (2005a) found that that meaningful guidance and instruction occurs in mentoring between youth and older peers. One of the reasons that peer mentorships may be successful may be due to the ability for students to establish and maintain stronger relationships due to the frequency of contact and close proximity (Komives, Lucas, & McMahon, 2013). Since peer mentors were in the same school daily as the mentees, they were accessible and meetings were able to occur

beyond the scheduled formal meeting times allowing for more connected relationships to develop. These interactions also can promote leadership and personal empowerment (Komives et al., 2013). In this case study, mentors built strong relationships not only with their mentees but with each other. Additionally, the mentors relied on utilizing and expanding their prosocial skills to engage with their mentees in a successful manner. Later parts of chapter will provide a detailed interpretation of these mentor-mentee relationships as well as the mentors' relationships with one another.

The positive peer relationships that were developed among the mentors and mentees provided increased social connections, built elements of social capital and demonstrated prosocial behaviors for the mentors. An investigation of school-based, peer-to-peer, cross-age mentoring was important since high school students spend most of their time in school and mentoring in schools may provide a form of social support leading to high school success for both the mentor and the mentee. This chapter will interpret why this occurred and what it may mean to high school peer mentoring programs. Additional studies would be needed to provide more data to support these conclusions.

Summary of the Results

The research data revealed four main themes that addressed the research questions from the mentor interviews: (a) self in present and self in future, (b) volunteerism and social capital, (c) servant leadership, and (d) connectedness and school belonging. The four themes categorized the mentors' perceptions of their individual development and their perceived impact on their personal development as a result of being a part of a mentoring relationship. This study, as evidenced in the survey, interview, and observational data, revealed participation in the peer-to-peer mentoring program increased the mentors' prosocial skills of school involvement, school

connection, and social capital. The focus of this case study was to examine the experiences of peer mentoring in a high school setting from the perspective of the peer mentors. In the context of the study, a qualitative case study approach provided the most appropriate method to explore the experiences of the high school mentors participating in peer-to-peer mentoring program.

This study was guided by two research questions from the perspective of the peer mentor:

- 1) To what extent does peer mentoring increase the peer mentors' prosocial skills of school involvement, school connection, and social capital?
- 2) Do mentors report identifiable differences between matches that are same gender or different gender, or differences between age differences and different gender? If they do, what are the reported differences? If they do not, what are the reasons for the lack of reportable differences?

Sub-Questions

- a. What is the impact or effect of mentoring on the youth mentor?
- b. What effect does the quality of training of mentors prior to the mentorship match have on the mentoring relationship?
- c. Why is it important to support and provide ongoing training for peer mentors?

While it could not be concluded whether or not peer mentoring alone increased peer mentors' school involvement, peer mentors did indicate an increased belief about their feeling of school connectedness and school belonging and in the field note observational data. The data do not support a conclusion that this was solely due to participation in the peer mentoring program because each of the peer mentors were already involved in some type of extra-curricular activities through sports, student leadership, and/or National Honor Society (NHS) or a combination of these school related activities. It is important to note that most of the mentors did

indicate that they had participated in new activities during this school year with their mentees. Mentor 102 shared, “Most all of my activities are new this year. Once I started mentoring, I decided I needed to try new things both on my own and with my partner.” Mentors indicated that they had tried new activities with their mentees in an effort to introduce new extracurricular school activities to the mentees.

In this study, mentors expressed a need to assist their mentees and a strong desire to be present and available to help. The mentors expressed an increase in these feelings as the study progressed. Creating relationships and assisting other younger students are strategies that support increased social capital, prosocial skills, and school connectedness. As the study progressed, the mentors expanded their ideas about their strengths and skills that they could use with mentees as a mentor. For example, Mentor 107 shared:

I relate well to others and have a sense of compassion for other that I don't know that I ever had before. I was pretty self-centered and maybe not even a very good person. My qualities and strengths is that I know that I can change and can help others and see that they can change and grow and make the world that they live in better. Little changes make big changes ... I feel I can be compassionate to others during a time that can be uncertain and stressful.

At the conclusion of the study, the mentors expressed thoughts and ideas about their future involvement in contributing to the community and helping others. The peer mentoring activities in this study allowed high school peer mentors to serve as peer advisors, pairing more experienced students with less experienced students increasing mentors' own feelings of social capital and school and community connectedness. Mentor 108 reported the following ideas about the program and future involvement in helping others:

I understand that others may not understand something the first time or have the same opportunities that others may get. Sometimes people need a helping hand or someone to reach out and make them feel valuable. By doing this, I feel valuable too. The more I do it, the better I feel and the more I want to do it My life goal is to help others. That is all I really want in life.

One of the key areas that the mentors built social capital and school connectedness was through community service activities. Many of the community service activities the mentors engaged in throughout the larger community were either organized through service groups from school or coordinated with peers from school. Mentor 102 explained, “The community service I am able to do as a part of this [mentoring program] helps me feel like I am connected to the school.” Community service activities were also the activities in which mentors indicated that they had participated in that had developed their own major peer relationships. Therefore, these mentors sought to involve mentees with the intent to assist them in developing positive peer connections at the high school. The activities that students chose to become involved in throughout their mentoring partnership appeared to encourage and develop activities that would promote prosocial and social capital connections and behaviors. This can be inferred by the mentors’ statements during interviews about their desires to continue involvement in volunteer, community service, and other networking activities after they leave high school and in the future.

There was one area related to school involvement, school connectedness, and social capital in which the results of the study were not able to clearly identify discern conclusions related to participation in the peer mentoring program on its own. First, the results of the study were not able to clearly identify whether or not peer mentoring on its own increased the student mentors’ involvement in school activities. All of the mentors indicated involvement in previous

school activities prior to becoming a mentor and were in the process of signing up for various school activities at the beginning of the school year when the mentoring program was implemented. Mentors were already active in leadership, sports and other school activities. Despite this previous involvement in school activities, the mentors actively engaged in activities during the school year with the other mentors, with mentees, and individually. Because the study did not utilize participants who had never been involved in any school activities previously, it cannot be concluded that school involvement was only a result of the mentoring program.

Additionally, mentors did not report on specific differences regarding the configuration of the gender matches through the surveys or interview. Differences in the quality of relationships based on gender/age were also not observed during the course of the study. There was not enough reported data regarding identifiable differences between matches that were same gender or different gender, or differences between age differences and different gender by the participants in this study. It was observed that all relationships were positive regardless of gender/age. Therefore, this study is not able to support a conclusion regarding relationship quality and configuration of the gender matches. I can infer from the interview, field notes, and observational data, that gender may not be as important as connectedness between the mentor and mentee.

Discussion of the Results

The quantitative portion of the research study examined the relationship between connectedness of the mentors to peers, to their neighborhood and their perspectives of the self-in-present. The one-way within subjects ANOVA was conducted with the data from the Hemingway Survey with the factor being the number of weeks mentoring in the mentoring program and the dependent variables being connectedness to peers, self-in-present, and

connectedness to neighborhood. The results from this data were not statistically significant. This was likely due to two main factors. First, the study sample was small with only seven mentors participating in the study and second, the period of the study was over the course of one academic semester. Connectedness to peers, self-in-present, and connectedness to neighborhood when related to participating in a mentoring program are more likely to reflect significant changes over a more substantial period of time and when there is a larger study sample.

Ultimately, the results demonstrated that the mentors did experience increases in the school connectedness, engagement in prosocial behaviors and social capital due to their involvement with the peer mentoring program. This was evidenced through the interviews and observations. A key component of the increase in social connectedness, engagement in prosocial behavior, and social capital was related to the ongoing support that the mentors received throughout the program. Research indicates that training, supervision, and ongoing support may be particularly important in nurturing the success of peer mentoring relationships (Garringer & MacRae, 2008; Herrera, Kauh, Cooney, Grossman, & McMaken, 2008). A dedicated site coordinator can ensure that the program is functioning and that mentoring matches have access to advice and support that can help them work through any relationship difficulties. Such supports provided for the mentors in this study included structuring matches and providing ongoing support to mentors with access to resources, space, or supplies.

Data from the observations with peer mentors provided some insight into their perceptions of the training that the mentors received. The review of previous research had indicated that the more training that peer mentors receive, the more they will be equipped for successful experiences with their mentees (Heirdsfield, Nelson, Tills, Cheeseman, Derrington, Walker, & Walsh, 2008). Mentors were provided a series of trainings in preparation for their

mentoring. Such support and ongoing training for peer mentors was necessary as the high school peer mentors were adolescents and students themselves with only two more years of experience in the high school setting with academics and social experiences.

Peer mentors required explanation and training by mentor program advisors about how to best work with their mentees and how to set achievable goals within their mentoring relationship. Additionally, mentors asked for what to help mentees to say when mentees had the need to advocate for themselves. During program sessions, mentors expressed to the behavior specialist that they did not always feel confident in handling relationship issues that arose during the mentoring sessions. The mentors identified to the behavioral specialist that the relationship issues that were generally those experienced by the mentees with other peers in their grade or with teachers. Mentors assisted in providing advocacy for mentees in peer settings throughout the school in academic and social settings or during peer social conflicts with other peers outside of the program. These activities assisted in the development of the mentors' engagement in volunteerism and social capital. Ongoing training would assist with the support of these positive connections. These trainings allowed mentors to continue working with mentees without experiencing lags in assisting them or moving forward with activities, as shared by mentors during informal conversations. From this it can be inferred that ongoing relationship development training would be necessary and constructive in order to support future mentors.

Volunteer activities such as mentoring develop connections with people who might otherwise not have developed a relationship or contact with one another. Along with this volunteer activity of mentoring, the mentors also were involved in both school-based and community service activities with their mentees. Many of the community service activities the mentors engaged in throughout the larger community were either organized through service

groups from school or coordinated with peers from school. Community service activities were also the activities in which mentors indicated that they had participated in that had developed their own major peer relationships. Therefore, these mentors sought to involve mentees with the intent to assist them in developing positive peer connections at the high school. Mentor 101 expressed:

I feel like my mentee would feel more connected if she could go to more sporting events and be a part of leadership. These activities would bring a sense of friendship and connection. This is why we do them.

The activities that students chose to become involved in throughout their mentoring partnership appeared to encourage and develop activities that would promote prosocial skills, social capital connections, and behaviors not only during the high school years but for the future. This can be inferred by the mentors' statements during interviews about their desires to continue involvement in volunteer, community service, and other networking activities after they leave high school. Mentor 101 shared, "I guess my long time goals go hand in hand with mentoring." The participation in community service, networking, and involvement of the mentees in these activities led to an unanticipated result of the development of servant leadership in mentors. Mentor 102 expressed, "I can help more than one person. Over time, I can work with lots of high schools and kids and spread this to many places, helping many students." Each of the mentors expressed a desire to provide leadership and service to others throughout high school and beyond.

Another research question addressed was related to identifiable differences between mentor matches that were same gender or different gender, or differences between age differences and different gender. It was difficult to discern identifiable differences between the

matches that were same gender or different gender or differences between age differences and different gender. The surveys did not clearly address the quality of gender matches or difference between age differences and different gender. The mentor interviews and observations did not reveal clearly identifiable differences between mentoring matches that were same gender or different gender, or differences between age differences and different gender. The female mentors who were matched to female mentees provided explanations about their relationships with their mentoring partners whereas as the different gender/age combinations did not provide as detailed explanations or descriptions. Additionally, female-to-female mentors detailed planning and executing more social activities with their mentees outside of the program such as going to the movies, coffee, community service, or spending time together. Social media contacts were also a part of these contacts and connections described by the female mentors who were matched to female mentees. This does not allow me to make the conclusion that these relationships were necessarily different, positive or negative than the other mentoring configurations. It simply allows the conclusion that in this particular study the three female-to-female mentors were more descriptive in expressing information about their relationship matches.

Few studies have focused on how gender-match configuration might shape peer-to-peer mentoring relationships. Studies examining gender differences in outcomes among mentoring program participants have been mixed and have focused primarily on adult to youth mentoring matches (DuBois, Holloway, Valentine, Cooper, 2002; Tierney, Grossman, & Resch, 1995), and few studies have looked at differences in relationship quality. According to Rhodes (2005), compared to boys' friendships, girls' friendships tend to be based more on intimacy, empathy, and self-disclosure. These conclusions have been used when discussing mentoring and gender

matches. However, widespread studies have not been conducted among peer-to-peer mentoring relationships. In the school district where this study took place, students from elementary school through high school are explicitly provided lessons about individuality and friendships developed related to all factors outside of gender. Friendships and peer development lessons are covered in school through counseling (weekly elementary classroom lessons), advisory (middle school and high school) and in widespread assembly presentations focused on anti-bullying, friendship building and acceptance of all individuals regardless of race, gender or creed. This may be a factor as to why the mentors in this study did not report clearly identifiable differences related to their gender matches and mentorships.

While the differences reported were small, there were minor differences that were reportable. This does not mean that one can draw clear conclusions from this data. While the male mentors did discuss their relationships but were brief in their descriptions. Female-to-female partners described more relationship details in their interviews. They also described more in and out of school contacts with their partners than the other partnering pairs. However, the male-to-male mentoring partners were observed in the community together as were the other gender match configurations that were not necessarily discussed during the interviews. Despite the brevity in explanation of other gender relationship combinations, mentors expressed a feeling of companionship, the importance of the connections and activities that they were engaged in with their mentees. Gillespie, Lever, Frederick and Royce (2015) summarized that gender differences in friendships do exist. They explained that female friendships are conducted face to face focusing on emotional self-disclosure, while male friendships are conducted side by side, focusing on activities centered on common interests and goals. Gillespie et al. (2015) focused on friendships that are naturally occurring and did not address intentionally created peer

mentorships. However, these outlined friendship characteristics can explain some of the differences viewed in this study between how males and females communicated about relationships differently. Finally, the more detailed information could be related to individuals' personality, language and/or conversational ability. However, with such a small sample and without specifically reported data about gender matches, a conclusion regarding the impact or success of one type of gender match over another cannot be made.

Discussion of the Results in Relation to the Literature

As discussed in Chapter 2, Coleman believed that increasing social capital through strengthening social relationships increases overall personal awareness and achievement (Coleman, 1990). This was evident in the mentors' overall school and community connectedness and involvement while involved in the peer mentoring program. Mentors shared their positive feelings about their work with the mentees and the activities that they were involved in during the interviews. Observations identified that mentors were actively involved in on-campus activities, extra-curricular activities, and community service activities. Additionally, mentors clearly described their goals and plans for the future. Mentor 102 shared:

"I am involved in events and activities for the school community often. Many of these are new this year because I volunteer for them. I like to try to get others involved so that many hands are helping . . . I can help more than one person. Over time, I can work with lots of high schools and kids and spread this to many places, helping many students." Other mentors shared similar thoughts. Mentor 103 reflected about the future in this way:

I also will use these skills in whatever community I live and work in. I will always be involved in working with community programs to help others.

Mentor 107 expressed:

My qualities and strengths is that I know that I can change and can help others see that they can change and grow and make the world that they live in better. Little changes make big changes. I still want to be a labor and delivery nurse. I feel that I can be compassionate to others during a time that can be uncertain and stressful. I can help parents bring a baby into the world. I also feel that I can use those skills in positive ways in the community in which I live.

All these components increased the mentors' social capital that they did not have previous to their participation in the mentoring program. Coleman (1990) discussed in the literature the importance of student involvement in school to increase social awareness. Coleman (1990) also emphasized the importance of peer relationships and networking with other students as a component of social capital. It was through social awareness and networking that peer mentors increased their own social capital.

In relation to building and maintaining social capital, Coleman also discussed the importance of establishing trustful and caring relations (Coleman, 1990). The structure of the mentoring program allowed for the mentors to discuss both school and non-school related activities and build trusting and caring relationships. Mentor 102 discussed the mentoring relationship:

I try to be a good friend too. Um, being a good friend means like showing caring and compassion. Life can be really hard for a freshman . . . uhm, (laughs) it can be hard for everyone, actually. My job is to make it easier and improve the odds. The relationships are the most important thing I think.

The social capital approach argues that individuals are embedded in a network of interpersonal relations (Coleman 1988). The mentors committed to developing strong, interpersonal relationships with their mentees thus, developing social capital.

Jensen and Jetten (2015) discussed social capital as value derived from membership in social groups, social networks, or institutions. For the mentors in this study, the membership in the mentoring program allowed them to access one another as a resource as well as provided the opportunity to develop a sense of collective meaning and understanding about the mentoring process and program. Here, the mentors created, as Putnam (2000) described, a *shared meaning* and *shared purpose* through their activities with the mentees. Building a sense of school belonging, prosocial skills and assisting with academic success was the shared purpose of the peer mentors. This shared purpose was the different activities, both one-on-one activities as well as the large group activities, intended to support and involve the mentees in a positive transition to high school.

A new theme emerged in this study that was unexpected and unanticipated. This theme was not discussed in the literature review because it had not been an original focus of the study; however, it did become significant and warranted discussion. From the data, I interpreted that the mentors expressed a sense of servant leadership in their work with the mentees in their interviews. The term *servant leadership* was introduced by Robert Greenleaf (1970). According to Greenleaf (1970), a servant leader is one who begins with a desire to serve and then develops aspirations towards leading others. Each of the mentors expressed an unselfish focus on the mentees needs and a true desire to assist them and improve their lives and experiences in the high school. One of the characteristics that Greenleaf described of a servant leader is that of an inspired servant ethic that can positively change the quality of society (Greenleaf, 1970). This

was an ideal also expressed by the mentors in this study. Servant-leadership impacts the core of the individual and requires him/her to look beyond personal selfishness and need (Greenleaf, 1970). Mentor 103 stated, “I am very connected with how I feel and what I am involved in. This is why I think it is so important to involve younger students. I know how different I feel about school, myself and my future.” Each of the mentors expressed an unselfish focus on the mentees needs and a true desire to assist them and improve their lives and experiences in the high school.

The building of social capital in others was accomplished through the mentors contributing time to building relationships with their assigned mentees with no expectation of extrinsic benefit. Mentors shared the feelings of fulfilment at working together as a team to develop activities and ideas for the mentees. This building of social capital creates an environment that is built on relationships and the development of individuals who care and are cared for in return (Greenleaf, 1991; Noddings, 1995). Mentors also benefited from interacting with each other in positive ways, building new relationships beyond their regular social group and contributing to others. The interviews showed that mentors shared opportunities for increased student leadership and volunteerism as ways in which they were positively impacted and ways in which they had experienced an increased connection to students and community members. Research studies have shown that most people believe that helping others is a good way to gain personal fulfillment (e.g., Wuthnow, 1993) and further builds the framework of social networks. Mentors felt that their encouraging and supportive relationships provided support, guidance, and friendship to students who really needed them. Mentor 107 expressed:

[Mentoring] ... had helped me feel like there is one thing that I’m able to do to help around the school and make people feel welcome. I see these this as an important long

terms solution to how we help all students. It is about building relationships and making students feel welcome and building a sense of welcome from the moment freshman walk in the door.

Statements and actions reflecting connectedness to mentees were not differentiated based upon gender/age matches. Questions in the interviews did not specifically ask about gender but about the mentors' relationships with their mentees. The survey data did not reflect differences in relationship quality based on gender/age. Additionally, the interviews did not provide data reflecting stronger or weaker relationships based on gender/age.

In this study, while all mentors were actively involved in the mentoring program, females were more articulate about their relationships than were the male mentor participants. However, the male mentor participants did indicate feelings of caring and deep commitment to the program and their mentoring partner regardless of gender. I noted in the interviews and field observations that both females and males were actively involved in their mentoring relationships and demonstrated concern and care for the mentees. It is possible that there are other reasons that the female-to female partnerships appeared to provide more details in their descriptions about their relationships. Gilligan's research (1993) discussed the differences between males and females in their actions, attitudes, and feelings towards caring, relationships, and connections with others. This is significant when considering the relationships of mentors and their attitudes about the quality of their mentoring relationships. Gilligan (1993) identified that females are more concerned with care, relationships, and connections with others than males. It is possible that females are more articulate in describing their feelings about their relationships than males, yet have equally strong relationships.

The observational data presented in Chapter 4 regarding gender and peer mentoring is not reflective of earlier research findings (Eisenhart & Holland, 1983; Macoby, 1988, 1990).

Differences in the relationships did not seem to be related to gender in the matches observed, interviewed or surveyed. Past research has shown that females and males have been found to have a similar number of peer attachments (Claes, 1992; Wentzell & Caldwell, 1997). This appeared to be reflective of the attachments of the mentors to the mentees in this study as well. Noted in this study was that male mentors were as involved with their female and male mentees as female mentors were involved with their female and male mentees. There may be various reasons for these results. One reason may be attributed to how the mentors organized themselves. The mentors as a group organized themselves as a unit. While mentors were assigned a particular mentee, all of the mentors worked with all of the mentees. There were frequent scheduled, organized group activities outside of the scheduled mentoring class time. This type of organization and scheduling allowed for the mentors to work together to establish positive relationships with all of the mentees. The ongoing literature review revealed that Elliot, Leck, Orser, and Mossop (2007) found that male mentors are less likely to trust female mentees than male mentees; however, this was not evident in this study.

In line with the literature, this study showed that trust was an essential component of the growth of the successful mentoring relationships for both genders. According to Kutilek and Ernest (2001) an environment of trust and mutuality must be established in mentoring relationships. For this to occur, it was important for mentors and mentees to become acquainted and develop a relationship. It was important for the mentor and mentee to become acquainted with each other and begin developing goals. Both male and female mentors assisted the mentees in creating goals and had an agenda when organizing their meeting times with their mentees.

Contrary to research surrounding gender differences in peer relationships (Eagly & Crowley, 1986; Martin & Fabes, 2001; Rose & Rudolph, 2013) both male and female mentors played an encouraging and supportive role for the mentees. The mentors worked together to provide problem solving, nurturing, planning and skill development to the mentees.

It was expected that there would be evidence of modeling and imitation present among mentees as they would seek to engage in activities, similar to those of their peer mentors. While this certainly was the case with the mentees modeling and imitating prosocial behaviors of the mentors, this was not the area of interest in this study. It is evident that peers with positive attitudes and behaviors in the school setting have the positive effect of encouraging and teaching younger youth to model positive prosocial skills in the school setting. Researchers identify adolescent prosocial skills as those including: good problem solving (Marsh, Serafica, & Barenboim, 1981), being considerate, and resiliency (Strayer & Roberts, 1989), considerate (Graziano, Hair, & Finch, 1997), sociable, and a tendency to help others. Based on mentor applications and early interview information, it appeared that the mentors all possessed prosocial skills. This was observed through their ability to connect early in the program with other mentors and organize themselves in a collaborative manner in promoting strong connections with their mentees. Throughout the study, mentors identified themselves in interviews as: empathetic, considerate, and helpful. While the mentors possessed prosocial skills, engagement in the mentoring program increased these skills. Mentors demonstrated a gradual increase in prosocial skills through their independency and leadership with their mentees, their school activities, and community activities.

The organization of the mentors reflected Bandura's (1977, 1986) social learning theory of modeling and imitation. While it was an unexpected result of this study, the mentors worked

with more mentees than their assigned mentee. Similarly, to that of a teacher, the mentors modeled a classroom teacher's role, rotating among all of the mentees, developing relationships with all mentees, and tailoring communication specific to each.

Mentor 103 shared:

If there is anything I have learned through high school it is that it our job to reach out and improve the lives of others. I don't think classes teach that. Teachers and coaches teach it in different ways. It is something I would like to be involved with long term.

Through these observations, it was concluded that the mentors modeled and imitated behaviors that they had experienced previously.

McCaslin and Good (1996) stated, "Learning is socially situated" (p. 642). Mentors relied on role models that they had experiences with in previous social-school experiences such as the classroom, sports participation, and school leadership. Broderick and Blewitt (2010) explain that this type of social learning is indicative of the learner observing a model performing a behavior, and from close observation, learns it. From their previous experiences and social learning, the mentors organized themselves in a similar fashion to what they had previous observed. By rotating classroom leadership during the mentoring program, the mentors imitated how the classroom teacher had instructed the leadership class, as an example. This social learning may be able to provide a framework for implementing future peer-to-peer mentoring programs and how to encourage and facilitate prosocial skill development among mentors.

According to Erikson (1968) adolescents face the task of *identity vs. role confusion*. Here, adolescents are engaged in developing a sense of self. This was apparent in this study as the mentors developed a sense of self in present and self in future. Over the course of the study, the mentors clearly identified their own personal strengths as individuals who could contribute to

others and, later, their hopes and goals for themselves in the future. Erikson's theory (1968) indicated an adolescent's progression through various roles and ideas as individuals discover their adult sense of self and future goals. The mentors displayed success at this stage demonstrating a strong sense of self, identifying through the interviews a strong sense of personal identity, goals for the future, and an understanding of others' perspectives.

Limitations

As previously discussed, both the small sample size and the short study period were a limitation in gathering data in this study. Secondly, an unanticipated result of the mentors organizing themselves into a cohesive mentoring group rather than focusing only on the one-on-one mentoring relationships may have influenced the reportable differences in this category. Here, mentors' perceptions, reactions, and reflections may have been intertwined with their experiences with other mentees rather than the specific mentee they were intentionally paired with. Both positive and negative impressions by mentors involved more than one mentee and may have influenced the overall perceptions and experiences had by the mentors. Perhaps an issue to explore in future studies is whether mentors' reported impacts could translate into observable effects related to a single mentee and mentor pairing.

An additional limitation of the study was that the interpersonal relationships that developed off campus could not be monitored or tracked effectively. As the relationships became more established, the mentors and mentees developed relationships with each other that included communications and activities off-campus: mentees with mentees; mentees with mentors; mentors with mentors. These communications and activities may have resulted in further connectedness within the group and among individuals that may have been relevant in the

mentors' feelings of school connectedness, development of prosocial behaviors and building of social capital. This study did not measure these interactions.

The study was also limited in that it was not able to control for the effects of any potential past mentoring experiences the mentors may have been involved in. If pre-conceived notions of mentoring were present among mentors, the success of the relationship could have been affected. Additionally, the mentee's self-efficacy was not examined prior to the study. Although the length and nature of the interview questions allowed for rich qualitative data, follow-up quantitative research is recommended with a much larger sample size in order to draw generalizeable conclusions. An additional limitation of the study was that the interpersonal relationships that developed off-campus could not be monitored or tracked effectively. As the relationships became more established, the mentors and mentees developed relationships with each other that included communications and activities off-campus: mentees with mentees; mentees with mentors; mentors with mentors. These communications and activities may have resulted in further connectedness within the group and among individuals that may have been relevant in the mentors' feelings of school connectedness, development of prosocial behaviors and building of social capital. This study did not observe these interactions.

The study was also limited in that it was not able to control for the effects of any potential past mentoring experiences in which the mentors may have been involved. Past mentoring experiences may have caused mentors to have preconceived ideas about this mentoring experiences. If pre-conceived notions of mentoring were present among mentors, the success of the relationship could have been affected. For example, mentor's expectations about their role as a mentor, as an advocate, and as a friend within the mentoring relationship could potentially have affected the developing relationships. Whether or not mentors had participated as a mentor in

the past, mentors may have held expectations prior to the relationship. Mentors' expectations may have been more positive or negative than the reality of their developing roles as a mentor. Mentors' actual experiences as a mentor may have been more positive or more negative than their expectations. The difference between the actual experience and the expectation is not controllable by a researcher. A mentee's self-efficacy may have either positively or negatively impacted his/her mentor's perception of the mentoring experience and association with school connection and social capital. A mentee with a strong, positive self-efficacy may have positively impacted the peer-to-peer mentoring relationship. A mentee with underdeveloped, weaker sense of self may have negatively impacted the peer-to-peer mentoring relationship.

Implication of the Results for Practice, Policy, and Theory

As has been noted, the existing literature related to peer mentoring in schools with high school participants is small. Literature related to peer-to-peer mentoring at the high school level is also very small. This study was designed to explore the experiences and perceptions of the mentors in the peer mentoring process. It is important to note that the results of this study may not be easily transferred to other peer mentoring programs because the study examined the perspectives of a small group of peer mentors within a particular program at a specific point in time. The process, instrumentation, and methods of this study are transferable. This particular study adds to the current literature in ways that may suggest considerations for others interested in implementing peer-to-peer mentoring programs. This study specifically addressed the benefits that high school mentors derived when involved in a peer-to-peer mentoring. The increases in the mentors' own prosocial skills, involvement in and building of social capital and increased participation and connectedness to their school were all contributions to the existing literature. These results may assist in program development for other high school peer-to-peer mentoring

programs. Surprising results in this study was the natural relationship development among the mentors and their own organization among each other in creating a collaborative and supportive program for the mentees. These results allow others interested in implementing peer-to-peer mentoring programs to devise and provide training and direction to mentors, as well as offer other opportunities for leadership training, community and school connections, and other community service activities.

The current study suggests that a peer-to-peer mentoring component can add to the knowledge of mentors and mentees enrolled in a rural high school. School districts are struggling with budget cuts that mean fewer educators are being hired and available to provide programming to students to prepare them for specifically for the world of high school or the world beyond high school. One catalyst for the addition of a peer mentoring component to the rural high school under study was that the staffing and programming could no longer meet the demand for the need of incoming students needing transition supports nor was it providing opportunities for students seeking leadership or community service opportunities on campus. Drawing upon the experiences and knowledge of peer mentors helps increase the understandings of how to expand such programs in a positive manner. Peer mentoring programs empower students to create positive change in their environments, are student-led, and thrive within communities that value and support the program. These programs provide potential student mentors with opportunities to refine and build upon their leadership skills, gain new knowledge, develop new attitudes, and gain experience in the role as leaders. In order to prepare mentor to be leaders beyond high school, peer mentoring programs require a strong focus on the leadership development and ongoing training of mentors.

The literature and the experiences of mentors in the current study suggest that peer-to-peer mentoring is enhanced when mentors receive appropriate preparation for the mentoring role as well as on-going training and support. These trainings cannot always be pre-planned as some of the relational issues that occur cannot be predicted so it is important to provide time for mentors to debrief with a knowledgeable adult to allow for mentors to express concerns and ideas. These informal sessions allowed the on-site adults to gather information quickly for mentors and provide relevant skill building to allow for a continuous and fluid operation of the mentoring program. Such issues that occurred were those related to how to assist mentees in advocating for themselves with teachers, how to access clubs or activities when finances were an issue and how to navigate changing class schedules or accessing on-campus services. The mentor orientation for this study included information about the basic responsibilities of peer mentors. This orientation provided an introduction to skills to enhance the effectiveness of the mentors, such as ways to build trusting relationships, effective communication and listening skills, and effective feedback skills. Additional orientation topics might include the various programs available to students in the school. Of the many programs available, many of the mentors had never accessed them and some were unaware of the programs that were available to assist and support students, such as comprehensive counseling services, services for homeless students, after-school tutoring, and access for all students despite income to intramural clubs and activities. This information, at the beginning of the program, would have been helpful to the mentors in early establishment of relationships with the mentees.

Recommendations for Future Research

This study examined the mentors' perceptions of the impact of a peer-to-peer mentoring program relationships and their influences on mentors' school involvement, school

connectedness and social capital. Additionally, the relationships were examined to determine whether there were increases in school connectedness, prosocial behaviors, and social capital of the peer mentors over the course of the study as a result of the peer mentoring relationships. Due to the limitations of the study and various factors that became evident during the study, there are several recommendations for future research to extend this research. Although there are many positives that accumulate with high school students who mentor, there are some challenges which need to be considered in this type of program implementation. The inexperience of high school mentors does become evident over time. High school mentors, in comparison to adult mentors, may not be as consistent in meeting with their mentee or in continuing the relationship for a second year as an adult mentor (Herrera et al., 2008). This particular study was not long enough to measure relationship longevity. However, issues related to adolescent inexperience did occur and required adult intervention and training to assist the mentors. Here, a potential limitation is that peer-to-peer mentoring can vary in the in the amount of support, structure and training provided to the mentors themselves (Karcher, 2009). Such support and training can cause discrepancy among reported results among different studies and outcomes. Despite the fact that this study was a school system utilizing mentors, costs associated with mentoring programs in the school system must be considered. Although school systems are beginning to utilize students as mentors, it should not suggest that there is no cost to the program implementation (Karcher, 2009). Such programs require staff for student training and records management as well as other key components of implementing and maintaining the program. In this study, staff providing student training and supervision as well as records management were provided by the school district.

Expanding the current study in order to validate research findings would assist in adding to the research. This could be done by including multiple secondary schools with similar sized high school populations and increasing peer mentoring sample sizes. In addition, a researcher could conduct a comparative study or program comparison between the school mentoring programs in order to determine the differences in mentors' perspectives regarding increases in school connectedness as a result of participation in the peer mentoring. Researchers could replicate the current case study using longitudinal data to assess the relationship between the increase in prosocial behaviors and school connectedness over time by peer mentors. The current study could be conducted with the inclusion of parents' and teachers' perceptions of the peer mentoring program's impact on school connectedness, prosocial behaviors and social capital for students involved in peer-to-peer mentoring. Expanding the current study with additional variables of academic achievement, discipline data, and attendance rates would researchers to delve into undiscovered information. Additional variables offer insight into the impact peer-to-peer mentoring programs could have on the transitioning student as the move into the high school realm.

Researchers could conduct a comparative study between high performing and low performing schools in relationship to advisory programs in order to determine the differences in impact upon student achievement. A study comparing structured peer-to-peer mentoring programs with adopted curriculum to unstructured e-mentoring peer-to-peer mentoring programs, for example, would also provide relevant information. In a case study investigation, a researcher could examine the behaviors that occur within the different structures in order to determine the differences in impact upon students and increases in school connectedness, prosocial behaviors and social capital. Researchers could expand the current study with deeper

quantitative research using more information from the surveys at the beginning and ending points of the study. Larger sample populations would provide deeper qualitative research by providing more interviews, observations, and focus groups to support the quantitative research already revealed. Each potential study would provide important contributions to the literature on peer-to-peer mentoring.

Chapter 5 Summary

In this chapter, a brief overview of the problem, the purpose of the study, research questions, methodology, and major findings of the study are discussed. The main focus of this chapter was to present findings, in the mentors' voices, related to relevant literature on peer-to-peer mentoring programs, social capital and school connectedness. A discussion of the peer mentoring pairs in terms of gender matches was also discussed. All major findings of the study were discussed and analyzed. Unexpected findings were also shared and analyzed with a connection to literature. Finally, implications for action and recommendations or future research were addressed.

References

- Allen, J., Aber, J., & Leadbeater, B. (1990). Adolescent problem behaviors: The influence of attachment and autonomy. *Psychiatric Clinics of North America*, 13, 455–467. Retrieved from <http://www.people.virginia.edu/~psykliff/pubs/publications/allen%20aber%20leadbeater%201990.pdf>
- Aseltine, R. H., Dupre, M., & Lamlein, P. (2000). Mentoring as a drug prevention strategy: An evaluation of across ages. *Adolescent and Family Health*, 1, 11–20.
- Bandura, A. (1977). *Social learning theory*. Englewood Cliffs, NJ: Prentice-Hall.
- Bandura, A. (1986). *Social foundations of thought and action: A social cognitive theory*. Englewood Cliffs, NJ: Prentice-Hall.
- Bandy, T., & Moore, K. A. (2010). *What works for promoting and enhancing social skills: Lessons from experimental evaluations of programs and interventions*. Washington, DC: Child Trends.
- Batchelor, J. A., & Briggs, M. (1994). Subject, project or self? Thought on ethical dilemmas for social and medical researchers. *Social Science & Medicine*, 39(1), 949–954.
- Baxter, P., & Jack, S. (2008). Qualitative case study methodology: Study design and implementation for novice researchers. *The Qualitative Report*, 13(4), 544–559. Retrieved from <http://www.nova.edu/cupdx.idm.oclc.org/ssss/QR/QR13-4/baxter.pdf>
- Benner, A. D. (2011). The transition to high school: Current knowledge, future directions. *Educational Psychology Review*, 23(3), 299–328. doi:10.1007/s10648-011-9152-0
- Blakeslee, J. E., & Keller, T. E. (2012). Building the youth mentoring knowledge base: Publishing trend and coauthorship networks. *Journal of Community Psychology*, 40(7), 845–859. doi:10.1002/jcop.21494

- Blum, R. (2005). *School connectedness: Improving the lives of students*. Baltimore, MD: Johns Hopkins Bloomberg School of Public Health.
- Bowers-Campbell, J. (2008). Cyber “Pokes”: Motivational antidote for developmental college readers. *Journal of College Reading and Learning*, 39(1), 74–87. Retrieved from <http://files.eric.ed.gov/cupdx.idm.oclc.org/fulltext/EJ816621.pdf>
- Britner, P. A., Balcaza, F. E., Blechman, E. A., Blinn-Pike, L., & Larose, S. (2006). Mentoring special youth populations. *Journal of Community Psychology*, 34(6), 747–763.
doi:10.1002/jcop.21494
- Broderick, P. C., & Blewitt, P. (2010). *The life span: Human development for professionals* (3rd ed). Upper Saddle River, NJ: Pearson Education.
- Brody, J. (1991). *New York State mentoring training manual*. New York, NY: New York State Education Department.
- Brown, R. S. (1995). *Mentoring at risk students: Challenges and potential*. Ontario, Canada: Toronto Board of Education.
- Brutus, S., Aguinis, H., & Wassmer, U. (2013). Self-reported limitations and future directions in scholarly reports: Analysis and recommendations. *Journal of Management*, 39, 48–75.
doi:10.1177/0149206312455245
- Burke, K. (2008). *What to do with the kid who: Developing cooperation, self-discipline, and responsibility in the classroom*. Thousand Oaks, CA: Corwin Publishing.
- Burmeister, E., & Aitken, L. M. (2012). Sample size: How many is enough? *Australian Critical Care*, 25, 271–274. doi:10.1016/j.aucc.2012.07.002
- Bukowski, W. M., Newcomb, A. F., & Hartup, W. W. (Eds.) (1996). *The company they keep: Friendship in childhood and adolescence*. Cambridge, UK: Cambridge University Press.

- California Governor's Mentoring Partnership. (2002). *Recommended best practices for mentor programs, (ADP) 02-1121*. Retrieved from http://www.californiacasa.org/Downloads/Mentoring_Best_Practices.pdf
- Campbell, J. L., Quincy, C., Osserman, J., & Pedersen, O. K. (2013). Coding in-depth semistructured interviews: Problems of unitization and intercoder reliability and agreement. *Sociological Methods & Research*, 42(3), 294–320.
doi:10.1177/0049124113500475
- Cappella, E., Neal, J. W., & Sahu, N. (2012). Children's agreement on classroom social networks: Cross-level predictors in urban elementary schools. *Merrill-Palmer Quarterly*, 58(3), 285–313. doi:10.1353/mpq.2012.0017
- Carter, E. W., Hughes, C., Copeland, S. R., & Breen, C. (2001). Differences between high school students who do and do not volunteer to participate in peer interaction programs. *Journal of the Association for Persons with Severe Handicaps*, 26, 229–239.
doi:10.2511/rpsd.26.4.229
- Chan, C. S., Rhodes, J. E., Howard, W. J., Lowe, S. R., Schwartz, S. E., & Herrera, C. (2013). Pathways of influence in school-based mentoring: The mediating role of parent and teacher relationships. *Journal of School Psychology*, 15(1), 129–142.
doi:10.1016/j.jsp.2012.10.001
- Clark, M. L. (1991). Social identity, peer relations, and academic competence of African-American adolescents. *Education and Urban Society*, 24, 41-52.
doi:10.1177/0013124591024001004
- Clutterbuck, D., & Lane, G. (2005). *The situational mentor*. London, England: Gower.

- Cohen, K. J., & Light, J. C. (2000). Use of electronic communication to develop mentor-protégé relationships between adolescent and adult AAC users: Pilot study. *Augmentative and Alternative Communication*, 16, 227–38. doi:10.1080/07434610012331279084
- Coleman, J. E. (1988). Social capital in the creation of human capital. *The American Journal of Sociology*, 94, S95–S120. Retrieved from <http://courseweb.ischool.illinois.edu/~katewill/for-china/readings/coleman%201988%20social%20capital.pdf>
- Coleman, J. (1990). *Foundations of Social Theory*. Cambridge, MA: Harvard University Press.
- Copple, C., & Bredekamp, S. (2009). (Eds.). *Developmentally appropriate practice in early childhood programs serving children from birth through age 8*. (3rd ed.). Washington, DC: NAEYC.
- Corderoy, R. M., & Lefore, G. (1997). Tips and secrets for online teaching and learning: An inside view. In *Proceedings of the 14th Annual Conference of the Australian Society for Computers in Learning in Tertiary Education*, 135–140. Perth, Western Australia: Curtin University of Technology. Retrieved from <http://www.ascilite.org/conferences/perth97/papers/Corderoy/Corderoy.html>
- Courtney, R. (2000). *Summary Report: A guide for the journey: A research study into volunteer mentoring in Northern Ireland*. Belfast, Ireland: Volunteer Development Agency. Retrieved from <http://www.volunteernow.co.uk/fs/doc/publications/a-guide-for-the-journey-2001-full-report.pdf>
- Cravens, J. (2003). Creating a successful online mentoring program. In *Corporation for National and community service effective practices collection*. Retrieved from http://nationalserviceresources.org/epicenter/practices/index.php?ep_action=view&ep_id

- Creswell, J. W., & Miller, D. L. (2000). Determining validity in qualitative inquiry. *Theory into Practice*, 39(3), 124–131. doi:10.1207/s15430421tip3903_2
- Crooks, C. V., Chiodo, D., Thomas, D., & Hughes, R. (2009). Strengths-based programming for first nations youth in schools: Building engagement through healthy relationships and leadership skills. *International Journal of Mental Health and Addiction*, 8(2), 160–173. doi:10.1007/s11469-009-9242-0
- Dansky, K. H. (1996). The effect of group mentoring on career outcomes. *Group and Organization Management*, 21, 5–21. doi:10.1177/1059601196211002
- Dappen, L., & Isernhagen J. (2006). Urban and nonurban schools: Examination of a statewide student mentoring program. *Urban Education*, 41, 151–168. doi:10.1177/0042085905282262
- Davidson, W. S., & Redner, R. (1998). The prevention of juvenile delinquency: Diversion from the juvenile justice system. In R. H. Price, Cowen, E. L., Lorion, R. P., & Ramos-McKay, J. (Eds.), *Fourteen ounces of prevention: Theory, research, and prevention* (pp. 123–137). New York, NY: Pergamon.
- Dawson, P., Lockyer, L., & Ferry, B. (2007, July). *Supporting first year student supporters: An online mentoring model for supplemental instruction leaders*. Paper presented at the 10th Pacific Rim First Year in Higher Education Conference. Brisbane, Australia. Retrieved from <http://ro.uow.edu.au/cgi/viewcontent.cgi?article=1958&context=edupapers>
- de Anda, D. (2001). A qualitative evaluation of a mentor program for at-risk youth: The participants' perspective. *Child and Adolescent Social Work Journal*, 18(2), 97–117. doi:10.1023/A:1007646711937

- Deci, E., Vallernad, R., Pelletier, L., & Ryan, R. (1991). Motivation and education: The self-determination perspective. *Educational Psychologist*, 26, 325–346.
doi:10.1080/00461520.1991.9653137
- Dedmond, R. (2006). Freshman transition programs: Long term and comprehensive. *Principals' Research Review*, 1(4). Reston, VA: National Association of Secondary School Principals.
- Denzin, N. K. (1978). *The research act: A theoretical introduction to sociological methods*. New York, NY: McGraw-Hill.
- Deutsch, N., & Spencer, R. (2009). Capturing the magic: Assessing the quality of youth mentoring relationships. *New Directions in Youth Development: Theory, Practice and Research*, 121, 47–70. doi:10.1002/yd.296.
- Dotterer, A. M., & Lowe, K. (2011). Classroom context, school engagement, and academic achievement in early adolescence. *Journal of Youth and Adolescence*, 40(12), 1649–1660. doi:10.1007/s10964-011-9647-5
- Downey, G., & Feldman, S. (1996). Implications of rejection sensitivity for intimate relationships. *Journal of Personality and Social Psychology*, 70(6), 1327–1343. doi:10.1037/0022-3514.70.6.1327
- Dubois, D. L., Holloway, B. E., Valentine, J. C., & Cooper, H. (2002). Effectiveness of mentoring programs for youth: A meta-analytic review. *American Journal of Community Psychology*, 30, 157–197. doi:10.1023/A:1014628810714
- Dubois, D. L., Portillo, N., Rhodes, J. E., Silverthorn, N., & Valentine, J. C. (2011). How effective are mentoring programs for youth? A systematic assessment of the evidence. *Psychological Science in the Public Interest*, 12(2), 57–91.
doi:10.1177/1529100611414806

- Durlak, J. A., Weissberg, R. P., Dymnicki, A. B., Taylor, R. D., & Schellinger, K. B. (2011). The impact of enhancing students' social and emotional learning: A meta-analysis of school-based universal interventions. *Child Development*, 82(1), 405–432. doi:10.1111/j.1467-8624.2010.01564.x
- Eagly, A. H., & Crowley, M. (1986). Gender and helping behavior: A meta-analytic review of the social psychological literature. *Psychological Bulletin*, 100, 283–308. doi:10.1037/0033-2909.100.3.283
- Eby, L. T. (1997). Alternative forms of mentoring in changing organizational environments: A conceptual extension of the mentoring literature. *Journal of Vocational Behavior*, 51(1), 125–144. doi:10.1006/jube.1997.1594
- Eisenberg, N., Fabes, R. A., & Spinrad, T. L. (2006). Prosocial development. In W. Damon, R. M. Lerner (Eds.), & N. Eisenberg (Vol. Ed.), *Handbook of child psychology: Vol. 3: Social, emotional and personality development* (6th ed., pp. 646–718). Hoboken, NJ: Wiley.
- Elliott, C., Leck, J. D., Orser, B., & Mossop, C. (2007). An exploration of gender and trust in mentoring relationships. *Journal of Diversity Management*, 1, 1–11. doi:10.19030/jdm.v1i1.5024
- Ensher, E., Heun, C., & Blanchard, A. (2003). Online mentoring and computer-mediated communication: New directions in research. *Journal of Vocational Behavior*, 63, 261–288. doi:10.1016/S0001-8791(03)00044-7
- Erikson, E. (1968). *Identity: Youth and crisis*. New York, NY: W. W. Norton.

- Ferguson, R. F., & Snipes, J. (1994). Outcomes of mentoring: healthy identities for youth. *Reclaiming Children and Youth*, 3(2), 19–22. Retrieved from http://uwinnipeg.ca/faculty/ius/iusweb/pdf/unlocking_hidden_potential_interim.pdf
- Fernandes-Alcantara, A. L. (2012). *Report to congress: Vulnerable youth federal mentoring programs and issues*. Washington, DC: Congressional Research Service. Retrieved from http://digital.library.unt.edu/ark:/67531/metadc87334/m1/1/high_res_d/RL34306_2012Jan20.pdf
- Fernandes, A. L. (2008). *Report to Congress: Vulnerable youth: Federal mentoring programs and issues*. Washington, DC: Congressional Research Service. Retrieved from <http://www.congressionalresearch.com/RL34306/document.php?study=Vulnerable+Youth+Federal+Mentoring+Programs+and+Issues>
- Freedman, M. (2008). *The kindness of strangers: Adult mentors, urban youth, and the new volunteerism*. San Francisco, CA: Jossey-Bass.
- Foster, L. (2001). *Effectiveness of mentor programs: Review of the literature from 1995 to 2000*. CRB-01-004. Sacramento, CA: California Research Bureau. Retrieved from <http://www.library.ca.gov/crb/01/04/01-004.pdf>
- Garringer, M., & MacRae, P. (2008). *An introductory guide: Mentoring resource center*. Folsom, CA: The Mentoring Resource Center. Retrieved from <http://educationnorthwest.org/sites/default/files/building-effective-peer-mentoring-programs-intro-guide.pdf>
- Gillespie, B. J., Lever, J., Frederick, D. & Royce, T. (2015). Close adult friendships, gender, and the life cycle. *Journal of Social and Personal Relationships*, 32(6), 709–736.
doi:10.1177/0265407514546977

- Gilligan, C. (1993). *In a different voice: Psychological theory and woman's development*. Cambridge, MA: Harvard Publishing.
- Gilligan, C. (1987). Adolescent development reconsidered. *New Directions for Child and Adolescent Development*, (37), 63-92.
- Glaser, B. G., & Strauss, A. L. (1967). *The discovery of grounded theory: strategies for qualitative research*. Chicago, IL: Aldine Publishing.
- Goode, W. W., & Smith, T. J. (2005). *Building from the Ground up: Creating effective programs to mentor children of prisoners – The amachi model*. Philadelphia, PA: Public/Private Ventures.
- Goodenow, C., & Grady, K. (1993). The relationship of school belonging and friends' values to academic motivation among urban adolescent students. *Journal of Experimental Education*, 62, 60–71. doi:10.1080/00220973.1993.9943831
- Gordon, J., Downey, J., & Bangert, A. (2013). Effects of a school-based mentoring program on school behavior and measures of adolescent connectedness. *School Community Journal*, 23(2), 227–249. Retrieved from <http://files.eric.ed.gov/fulltext/EJ1028864.pdf>
- Graziano, W. G., Hair, E. C., & Finch, J. F. (1997). Competitiveness mediates the link between personality and group performance. *Journal of Personality & Social Psychology*, 73(6), 1394–1408. doi:10.1037//0022-3514.73.6.1394
- Green, D., Mitchell, T., & Taylor, P. (2011). Mentoring in the art classroom. *Improving Schools*, 14(2), 117–129. doi:10.1177/1365480211410452
- Greenleaf, R. (1991). *The servant as leader*. Indianapolis, IN: The Robert K. Greenleaf Centre.
- Greenleaf, R. (1986). *On becoming a servant-leader*. Indianapolis, IN: Robert K. Greenleaf Centre.

- Grossman, J. B., & Johnson, A. W. (1999). Assessing the effectiveness of mentoring programs. In J. B. Grossman (Ed.), *Contemporary issues in mentoring* (pp. 48–65). Philadelphia, PA: Public/Private Ventures.
- Grossman, J. B., & Rhodes, J. E. (2002). The test of time. Predictors and effects of duration in youth mentoring programs. *American Journal of Community Psychology*, 30, 199–219. Retrieved from <http://www.rhodeslab.org/files/testoftime.pdf>
- Grossman, J. B., Chan, C. S., Schwartz, S. E. O., & Rhodes, J. E. (2012). The test of time in school-based mentoring: The role of relationship duration and re-matching on academic outcomes. *American Journal of Psychology*, 49, 43–54. doi:10.1007/s10464-011-9435-0
- Guetzloe, E. (1997). The power of positive relationships: Mentoring programs in the school and community. *Preventing School Failure*, 41(3), 100–104. doi:10.1080/10459889709603275
- Hair, E. C., Jager, J., & Garrett, S. B. (2002). Helping teens develop healthy social skills and relationships: What the research shows about navigating adolescence. *Child Trends Research Brief*. Washington, DC: Child Trends. Retrieved from http://www.hhs.gov/ash/oah/oah-initiatives/ta/paf_training2_healthysocialskills.pdf
- Hammond, C., Linton, D., Smink, J., & Drew, S. (2007). *Dropout risk factors and exemplary programs: A technical report*. Clemson, SC: National Dropout Prevention Center/Network. Retrieved from <http://files.eric.ed.gov/fulltext/ED497057.pdf>
- Harris, J. R. (1998). *The nurture assumption: Why children turn out the way they do*. New York, NY: Free Press.
- Heirdsfield, A., Nelson, K., Tills, B., Cheeseman, T., Derrington, K., Walker, S. & Walsh, K. (2008). *Peer mentoring: Models and outcomes at QUT*. AARE 2008 International

- Education Conference. Brisbane, QUT Digital Repository. Retrieved from <http://eprints.qut.edu.au/20378/1/c20378.pdf>
- Helms, S., & Marcelo, K. (2007). *Youth volunteering in the states: 2002 – 2006*. The Center for Information & Research on Civic Learning & Engagement: Fact Sheet. Retrieved from www.civicyouth.org.
- Herrera, C. (1999). *School-based mentoring: A first look into its potential*. Philadelphia, PA: Private/Public Ventures. Retrieved from <http://files.eric.ed.gov/fulltext/ED436598.pdf>
- Herrera, C. (2004). *School-based mentoring: A closer look*. Philadelphia, PA: Public/Private Ventures. Retrieved from https://www.researchgate.net/publication/234634113_School-Based_Mentoring_A_Closer_Look
- Herrera, C., Vang, Z., & Gale, L. (2002). *Group mentoring: A study of mentoring groups in three programs*. Retrieved from http://www.vamentoring.org/images/uploads/resources/PPV_Group_Mentoring_A_Study_2002.pdf
- Herrera, C., Grossman, J. B., Kauh, T. J., Feldman, A. F., McMaken, J., & Jucovy, L. Z. (2007). *Making a difference in schools: The Big Brothers Big Sisters school-based mentoring impact study*. Philadelphia: Public/Private Ventures. Retrieved from <http://www.biglittle.org/atf/cf/%7BDBCF2610-6B26-4954-8A21-94FA949AD023%7D/PPV%20School%20Base%20Mentoring%20Study%20Summary.pdf>
- Herrera, C., Kauh, T. J., Cooney, S. M., Grossman, J. B., & McMaken, J. (2008). *High school students as mentors: Findings from the Big Brothers Big Sisters school-based mentoring impact study*. Philadelphia, PA: Public/Private Ventures. Retrieved from http://www.ies.ed.gov/ncee/wwc/pdf/single_study_reviews/wwc_bbbs_031213.pdf

- Herrera, C., Vang, Z., & Gale, L. (2002). *Group mentoring: A study of mentoring groups in three programs*. Retrieved from http://www.vamentoring.org/images/uploads/resources/PPV_Group_Mentoring_A_Study_2002.pdf
- Holmes, D. R., Hodgson, P. K., Simari, R. D., & Nishimura, R. A. (2010). Mentoring: Making the transition from mentee to mentor. *Circulation*, *121*, 336–340. Retrieved from <http://ish-world.com/downloads/pdf/Circulation-2010-Holmes-336-40.pdf>
- Jekielek, S., Moore, K., & Hair, E. (2002). *Mentoring programs and youth development: A synthesis*. Washington, DC: Child Trends. Retrieved from <http://www.mentorwalk.org/documents/mentoring-synthesis.pdf>
- Jensen, D. H., & Jetten, J. (2015). Bridging and bonding interactions in higher education: social capital and students' academic and professional identity formation. *Psychology*, *13*, 126–156. doi:10.3389/fpsyg.2015.00126
- Kalsoom, F., Behlol, M.G., Kayani, M. M., & Kaini, A. (2012). The moral reasoning of adolescent boys and girls in the light of Gilligan's theory. *International Education Studies*, *5* (3), 15-23. doi: 10.5539/ies.v5n3p15
- Karcher, M. J. (2002). The cycle of violence and disconnection among rural middle school students: Teacher disconnection as a consequence of violence. *The Journal of School Violence*, *1*, 35–51. doi:10.1300/J202v01n01_03
- Karcher, M. J. (2004). Connectedness and school violence: A framework for developmental interventions. In E. Gerler (Ed.), *Handbook of school violence* (7–42). Binghamton, NY: Haworth Press.

- Karcher, M. J. (2005a). The effects of developmental mentoring and high school mentors' attendance on their younger mentees' self-esteem, social skills, and connectedness. *Psychology in the Schools*, 42, 65–77. doi:10.1002/pits.20025
- Karcher, M. J. (2005b). Cross-Age Peer Mentoring. In D. L. DuBois & M. J. Karcher (Eds.), *Handbook of youth mentoring* (pp. 266-286). Thousand Oaks, CA: Sage Publications.
- Karcher, M. J. (2006). What happens when high school mentors don't show up? In L. Golden & P. Henderson (Eds.), *Case studies in school counseling* (pp. 44–53). Alexandria, VA: ACA Press.
- Karcher, M. J. (2007). *Research in action: Cross-age peer mentoring*. (No. 7 in series). Alexandria, VA: MENTOR/National Mentoring Partnership. Retrieved from http://www.mentoring.org/downloads/mentoring_388.pdf
- Karcher, M. J. (2009). Increases in academic connectedness and self-esteem among high school students who serve as cross-age peer mentors. *Professional School Counseling*, 12(4). doi:10.5330/PSC.n.2010-12.292
- Karcher, M. J. (2011). *The hemingway: Measure of adolescent connectedness - a manual for scoring and interpretation*. San Antonio, TX: The University of Texas.
- Karcher, M. J., Davis, C., Powell, B. (2002a). Effects of developmental mentoring on connectedness and academic achievement. *School Community Journal*, 12(2), 36–50. Retrieved from http://www.michaelkarcher.com/CAMP_Articles_files/Karcher_02_DavisPowellCAMPSSK.pdf
- Karcher, M. J., & Lee, Y. (2002). Connectedness among Tawainese middle school students: A validation study of the Hemingway Measure of Adolescent Connectedenss. *Asia Pacific*

- Education Review*, 3(1), 95-114. Retrieved from http://www.michaelkarcher.com/School_connectedness_files/Karcher_02_LeeConn_Taiwan.pdf
- Karcher, M. J., Kupermire, G., Portwood, S., Sipe, C., & Taylor, A. (2006). Mentoring programs: A framework to inform program development, research, and evaluation. *Journal of Community Psychology*, 34, 709–725. doi:10.1002/jcop.20125
- Karcher, M. J., Holcomb, M., & Zambrano, E. (2008). Measuring adolescent connectedness: A guide for school-based assessment and program evaluation. In H. L. K. Coleman & Yeh, C. (Eds.), *Handbook of school counseling*, (pp. 649–669). Mahwah, NJ: Lawrence Erlbaum.
- Karcher, M. J., & Sass, D. A. (2010). A multicultural assessment of adolescent connectedness: Testing measurement invariance across gender and ethnicity. *Journal of Counseling Psychology*, 57(3), 274–89. doi:10.1037/a0019357
- Karnes, F., & Bean, S. (2010). *Leadership for Students: A guide for young leaders*. Waco, TX: Prufrock Press.
- Kato, Y., & Rudes, D. S. (2008). *Using ATLAS.TI for qualitative research. Introduction to ATLAS.ti Workshop Berkeley Law School*. Berkeley, CA: Berkeley Law School. Retrieved from [https://www.law.berkeley.edu/files/Atlas_Workshop--Part_II--Handout--Kato-Rudes--10-17-08\(1\).pdf](https://www.law.berkeley.edu/files/Atlas_Workshop--Part_II--Handout--Kato-Rudes--10-17-08(1).pdf)
- Keating, L. M., Tomishima, M., Foster, S., & Alessandri, M. (2002). The effects of a mentoring program on at-risk youth. *Adolescence*, 37(148), 717–734. Retrieved from <https://www.questia.com/library/journal/1G1-97723209/the-effects-of-a-mentoring-program-on-at-risk-youth>

- Kennelly, L., & Monrad, M. (Eds.). (2007). *Easing the transition to high school: Research and best practices designed to support high school learning*. Washington, DC: National High School Center at the American Institutes for Research. Retrieved from http://education.ky.gov/educational/CCadv/ar/Documents/Beginning_of_School_Year/resources/Better%20High%20Schools.pdf
- King, K. A., Vidourck, R. A., Davis, B., & McClellan, W. (2002). Increasing self-esteem and school connectedness through a multidimensional mentoring program. *Journal of School Health, 12*, 294–299. doi: 10.1111/j.1746-1561.2002.tb01336.x
- Kohlhauf, S., Stahl, J., & Wachholz, P. (2006). Cross-age mentoring: The buddy books project. *Perspectives in Peer Programs, 20*(2), 26–31.
- Komives, S., Lucas, N., & McMahon, T. (2013). *Exploring leadership for college students who to make a difference* (3rd ed.). San Francisco, CA: John Wiley & Sons.
- Kopinak, J. (1999). The use of triangulation in a study of refugee well-being. *Quality Quantity, 33*(2), 169–183. doi:10.1023/A:1026447822732
- Kruger, A. C. (1992). The effect of peer and adult-child transactive discussions on moral reasoning. *Merrill Palmer Quarterly, 38*(2), 191–211. Retrieved from http://scholarworks.gsu.edu/cgi/viewcontent.cgi?article=1003&context=epse_facpub
- Ku, H., Akarasriworn, C., Glassmeyer, D. M., Mendoza, B., & Rice, L. A. (2011). Teaching an online graduate mathematics education course for in-service mathematics teachers. *Quarterly Review of Distance Education, 12*(2), 135-147.
- Kutilek, L. M., & Earnest, G. W. (2001). Supporting professional growth through mentoring and coaching. *Journal of Extension, 39*(4). Retrieved from <http://www.joe.org/joe/2001august/rb1.php>

- Lam, C. M. (2012). Prosocial involvement as a positive youth development construct: A conceptual review. *The Scientific World Journal*, 2012, 1–8. doi:10.1100/2012/769158
- Lankau, M. J., & Scandura, T. A. (2007). Mentoring as a forum for personal learning in organizations. In B. R. Ragins & K. Kram (Eds.), *The handbook of mentoring at work: Theory, research, and practice* (pp. 249–271). Thousand Oaks, CA: Sage Publications.
- Lauver, S. (2004). Attracting and sustaining youth participation in after school programs. *The Evaluation Exchange*, 10(1), 4–5. Retrieved from <http://www.hfrp.org/evaluation/the-evaluation-exchange/issue-archive/evaluating-out-of-school-time-program-quality/attracting-and-sustaining-youth-participation-in-after-school-programs>
- Lawson, F. (2014). Mentoring matters: Ideas for students, teachers and you. *Communicator*, 37(5), 1-2. Retrieved from: <http://www.naesp.org/communicator-january-2014/mentoring-matters-ideas-students-teachers-and-you>
- Lewins, A., & Silver, C. (2007). *Using software in qualitative research: A step-by-step guide*. Thousand Oaks, CA: Sage Publishing.
- LoSciuto, L., Townsend T., Rajala, A., & Taylor, A. (1996). An outcome evaluation of across ages: An intergenerational mentoring approach to drug prevention. *Journal of Adolescent Research*, 11(1), 116–129. doi:10.1177/0743554896111007
- Madsen, C. K., Smith, D. S., & Feeman, C. C. (1988). The use of music cross-age within special education settings. *Journal of Music Therapy*, 25, 135–144. doi:10.1093/jmt/25.3.135
- Manning, M. M., Bear, G. G., & Minke, K. M., (2006). Self-concept and self-esteem. In G. G. Bear & K. M. Minke (Eds.), *Children's needs III: Development, prevention, and intervention* (pp. 341–356). Bethesda, MD: National Association of School Psychologists.

- Marcelo, K. B. (2007). *Volunteering among high school students*. The Center for Information & research on Civic Learning & Engagement: Fact Sheet. Retrieved from www.civicyouth.org
- Marsh, D. T., Serafica, F. C., & Barenboim, C. (1981). Interrelationships among perspective taking, interpersonal problem solving, and interpersonal functioning. *Journal of Genetic Psychology, 138*(1), 37–48. doi:1080/00221325.1981.10532840
- Martin, C. L., & Fabes, R. A. (2001) The stability and consequences of young children's same-sex peer interactions. *Developmental Psychology, 37*(3), 431–446. Retrieved from <http://www.apa.org/pubs/journals/releases/dev-373431.pdf>
- Masten, A. S., Roisman, G. I., Long, J. D., Burt, K. B., Obradovic, J., & Riley, J. R. (2005). Developmental cascades: Linking academic achievement and externalizing and internalizing symptoms over 20 years. *Developmental Psychology, 41*(5), 733–746. Retrieved from [http://web.stanford.edu/group/sparklab/pdf/Masten%20et%20al.%20\(2005,%20DP\)%20Academic%20Cascade.pdf](http://web.stanford.edu/group/sparklab/pdf/Masten%20et%20al.%20(2005,%20DP)%20Academic%20Cascade.pdf)
- Matinek, T., Schilling, T., & Johnson D. (2001). Transferring personal and social responsibility of underserved youth to the classroom. *Urban Review, 33*, 29–45. doi:101023:A:1010332812171
- McCaslin, M., & Good, T. (1996). The informal curriculum. In D. C. Berliner & R. C. Calfee (Eds.). *The Handbook of Educational Psychology*.(pp. 622-673). New York, NY: American Psychological Association/Macmillan.
- McCluskey, K. W., & Treffinger, D. J. (1998). Nurturing talented but troubled children and youth. *Reclaiming Children and Youth, 6*(4), 215–219. doi:10.1177/001698620504900406

- McLearn, K. T., Colasanto, D., Schoen, C., & Shapiro, M. Y. (1998). Mentoring matters: A national study of adults mentoring young people. In J. B. Grossman (Ed.), *Contemporary issues in mentoring*, (pp. 66–83). Philadelphia, PA: Public/Private Ventures.
- McNeely, C., Nonnemaker, J., & Blum, R. (2002). Promoting school connectedness: Evidence from the national longitudinal study of adolescent health. *Journal of School Health*, 72, 138–146. doi:10.1111/j.1746-1561.2002.tb06533.x
- McNeely, C. A., & Falci, C. (2004). School connectedness and the transition into and out of health risk behavior among adolescents: A comparison of social belonging and teacher support. *Journal of School Health*, 74(7), 284–292. doi:10.1111/j.1746-1561.2004.tb08285.x
- Merriam, S. B. (2009). *Qualitative case study research qualitative research: A guide to design and implementation* (2nd ed.). San Francisco, CA: Jossey-Bass.
- Merriam, S. B., Caffarella, R. S., & Baumgartner, L. (2007). *Learning in adulthood: A comprehensive guide* (3rd ed.). San Francisco, CA: Jossey-Bass.
- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis*. Thousand Oaks, CA: Sage Publications.
- Muhr, T. (1994). *ATLAS.ti. computer aided text interpretation and theory building, 1.1E. User's Manual* (2nd ed.). Berlin, Germany.
- Muilenburg, L. Y., & Berge, Z. L. (2005). Student barriers to online learning: A factor analytic study. *Distance Education*, 26(1), 29–48. doi: 10.1080/01587910500081269
- Munsch, J., & Blyth, D. A. (1993). An analysis of the functional nature of adolescents' supportive relationships. *Journal of Early Adolescence*, 13, 132–153.
doi:10.1177/0272431693013002001

- Neild, R. C. (2009). Falling off track during the transition to high school: What we know and what can be done. *The Future of Children*, 19(1), 53–76. Retrieved from http://www.futureofchildren.org/futureofchildren/publications/docs/19_01_04.pdf
- Newman, B. M., Lohman, B. J., & Newman, P. R. (2007). Peer group membership and a sense of belonging: Their relationship to adolescent behavior problems. *Adolescence*, 42(166).
- Noddings, N. (1995). *Philosophy of education*. Boulder, CO: Westview Press.
- Noddings, N. (1996). The caring professional. In S. Gordon, P. Benner, & N. Noddings (Eds.), *Readings in knowledge, practice, ethics, and politics* (pp. 21–32). Philadelphia, PA: University of Pennsylvania Press.
- O'Dwyer, L., Carey, R., & Kleiman, G. (2007). A study of the effectiveness of the Louisiana Algebra I online course. *Journal of Research on Technology in Education*, 39(3), 289-306.
- O'Neill, K. (2001). *Building social capital in a knowledge-building community: Telementoring as a catalyst*. Paper presented at the annual meeting of the American Educational Research Association, 2001. Retrieved from <http://www.sfu.ca/~koneill/DKO%20AERA%202001.pdf>
- O'Reilly, M., & Parker, N. (2012). Unsatisfactory saturation: A critical exploration of the notion of saturated sample sizes in qualitative research. *Qualitative Research Journal*, 13(2), 1–8. doi:10.1177/1468794112446106
- Osher, D., Sprague, J., Weissberg, R. P., Axelrod, J., Keenan, S., Kendziora, K., & Zins, J. (2007). A comprehensive approach to promoting social, emotional and academic growth in contemporary schools. *Best Practices in School Psychology*, 78(V), 1–16. Retrieved from http://www.thrivingstudents.org/sites/default/files/social.emotional.academic.growth.osher_.pdf

- Panitz, T. (1999). *Will you still be teaching in the twenty-first century*, Paper presented at the Reorganizing Knowledge, Transforming Institutions: Knowing, Knowledge and the University in the 21st Century Conference, University of Massachusetts. Retrieved from <http://home.capecod.net/~tpanitz/tedsarticles/teaching.htm>
- Parra, G. R., DuBois, D. L., Neville, H. A., Pugh-Lilly, A. O., & Povinelli, N. (2002). Mentoring relationships for youth: Investigation of a process-oriented model. *Journal of Community Psychology*, 30(4), 367–388. doi:10.1002/jcop.10016
- Patton, M. Q. (2002). *Qualitative research and evaluation methods*. (3rd ed.). Thousand Oaks, CA: Sage.
- Phelan, P., Davidson, A., Locke, H., & Thanh, C. (1992). Speaking up: Students' perspectives on school. *Phi Delta Kappan*, 73(9), 695–704. Retrieved from <http://web.stanford.edu/group/suse-crc/cgi-bin/drupal/sites/default/files/speaking-up.pdf>
- Portes, A. (1998). Social capital: Its origins and applications in modern sociology. *Annual Review of Sociology*, 24, 1–24. Retrieved from http://www.rect.muni.cz/summerschool/New_Europe/Module_3/Session%206/6_Portes_Social_Capital.pdf
- Portwood, S., Ayer, P., Kinmson, K., Waris, R., & Wise, D. (2005). Youth friends: Outcomes from a school-based mentoring program. *Journal of Primary Prevention*, 26, 129–145. doi: 10.1007/s10935-005-1975-3
- Prater, M., Serna, L., & Nakamura, K. (1999). Impact of peer teaching on the acquisition of social skills by adolescents with learning disabilities. *Educational and Treatment of Children*, 22(1), 748–849.
- Putnam, R. D. (1993). *Making democracy work: Civic Traditions in modern Italy*. Princeton, NJ: Princeton University Press.

- Putnam, R. D. (2000). *Bowling alone: The collapse and revival of American community*. New York, NY: Simon and Schuster.
- Quigley, R. (2004). Positive peer groups: Helping others' meets primary developmental needs. *Reclaiming Children and Youth*, 13(3), 134–137. Retrieved from <http://www.readbag.com/woodlandhills-resources-pdfs-positivepeergroups>
- Ramos, M. C. (1989). Some ethical implications in qualitative research. *Research in Nursing & Health*, 12, 57–63. doi:10.1002/nur.4770120109
- Reeves, D. B. (2008). The extracurricular advantage. *Education Leadership*, 66(1), 86–87. Retrieved from <http://www.zambialearning.org/images/September2008TheLearningLeader-TheExtracurricularAdvantage.pdf>
- Resnick, M. D., Bearman, P. S., Blum, R. W., Bauman, K. E., Harris, K. M., & Jones, J. (1997). Protecting adolescents from harm: Findings from the national longitudinal study on adolescents' health. *Journal of the American Medical Association*, 278(10), 823–832. doi:10.1001/jama.1997.03550100049038.
- Rhodes, J. (2001). Youth mentoring in perspective. *The Center*, Summer. Republished in *The encyclopedia of informal education*, Retrieved from www.infed.org/learningmentors/youth_mentoring_in_perspective.htm
- Rhodes, J. E. (2002). *Stand by me: Risks and rewards in youth mentoring*. Cambridge, MA: Harvard University Press.
- Rhodes, J., Reddy, R., Roffman, J., & Grossman, J. (2005). Promoting successful youth mentoring relationships: A preliminary screening questionnaire. *Journal of Primary Prevention*, 26, 147–167. doi:10.1007/s10935-005-1849-8

- Rhodes, J. E., Spencer, R., Keller, T. E., Liang, B., & Noam, G. (2006). A model for the influence of mentoring relationships on youth relationships. *Journal of Community Psychology*, 43(6), 691–707. doi:10.1002/jcop.20124
- Richman, J. M., Rosenfeld, L. B., & Brown, G. B. (1998). Social support for adolescents at-risk of school failure. *Social Work*, 43(4), 309–323. doi:10.1093/sw/43.4.309
- Roderick, M. (2006). *Closing the aspirations-attainment gap: Implications for high school reform*. Consortium on Chicago School Research. Retrieved from <http://www.mdrc.org/publication/closing-aspirations-attainment-gap>
- Rowe, D. C. (1994). *The limits of family influence: Genes, experience, and behavior*. New York, NY: Guilford Press.
- Ruiz, E. C. (2012). *Research summary: Setting higher expectations: Motivating middle graders to succeed*. Retrieved from <http://www.amle.org/TabId/270?ArtMID/888/ArticleID/307>
Research-Summary-Setting-Higher-Expectations.aspx/
- Salinas, C., & Reyes, R. (2004). Creating successful academic programs for Chicana/o high school migrant students: The role of advocate educators. *High School Journal*, 87(4), 54–66. doi:10.1353/hsj.2004.0015
- Sawyer, R. D. (2001). Mentoring but not being mentored – Improving student-to-student mentoring programs to attract urban youth to teaching. *Urban Education*, 36(1), 39–59. doi:10.1177/0042085901361004
- Schaps, E., Battistich, V., & Solomon, D. (2004). Community in school as key to student growth: Findings from the Child Development Project. In J. Zins, R. Weissberg, M. Wang, & H. Walberg (Eds.), *Building academic success on social and emotional learning: What does the research say?* (pp. 189-209). New York, NY: Teachers College Press.

- Schultz, K. (1999). Identity narratives: stores from the lives of urban adolescent females. *The Urban Review*, 31(1), 79–106.
- Seita, J., & Brendttrø, L (2005). *Kids who outwit adults*. Bloomington, IN: National Educational Service.
- Sherman, T. M., & Kurshan, B. L. (2005). Constructing learning: Using technology to support teaching for understanding. *Learning & Leading with Technology*, 32(5), 10–39.
Retrieved from <http://files.eric.ed.gov/fulltext/EJ697302.pdf>
- Simon, M., & Goes, J. (2013). *Dissertation and scholarly research: Recipes for success*. Seattle, WA: Dissertation Success, LLC. Retrieved from www.dissertationrecepies.com.
- Sinclair, C. (2013). Mentoring online about mentoring: possibilities and practice. *Mentoring & Tutoring*, 11(1), 79–94. doi 10.1080/1361126032000054826
- Snyder, M., Clary, E. G., & Stukas, A. A. (2000). The functional approach to volunteerism. In G. R. Maio & J. M. Olson (Eds.), *Why we evaluate: Functions of attitudes* (pp. 365–393). Hillsdale, NJ: Lawrence Erlbaum Associates. doi:10.13140/2.1.2008.6083
- Solomon, D., Watson, M.S., Delucchi, K.L., Schaps, E., & Battistich, V. (1988). Enhancing children's prosocial behavior in the classroom. *American Educational Research Journal*, 25(4), 527–554. doi:10.3102/00028312025004527
- Sparks, S. (2010). Time and stability seen as key to effective mentoring. *Education Week*, 30(4), 12–13. Retrieved from <http://www.edweek.org/ew/articles/2010/09/22/04mentor.h30.html>
- Spencer, R. (2007). “It's not what I expected”: A qualitative study of youth mentoring relationship failures. *Journal of Adolescent Research*, 22, 331–354.
doi:10.1177/0743558407301915

- Strayer, J., & Roberts, W. (1989). Children's empathy and role taking: Child and parental factors, and relations to prosocial behavior. *Journal of Applied Developmental Psychology*, 10(2), 227–239. doi:10.1016/0193-3973(89)90006-3
- Strauss, A., & Corbin, J. (1990). *Basics of qualitative research: Grounded theory procedures and techniques*. Newbury Park, CA: Sage Publications.
- Tarhan, L., Ayyildiz, Y., Ogunc, A., & Sesen, B. A. (2013). A jigsaw cooperative learning application in elementary science and technology lessons: Physical and chemical changes. *Research in Science & Technological Education*, 31(2), 184–203. doi:10.1080/02635143.2013.811404
- Tate, T. F. (2006). Peer influences and positive cognitive restructuring. *Online Journal of the International Child and Youth Care Network*, 84, 1–9. Retrieved from <http://www.cyc-net.org/cyc-online/cycol-0106-tate.html>
- Tellis, W. (1997). Introduction to Case Study. *The Qualitative Report*, 3(2). Retrieved from: <http://www.nova.edu/ssss/QR/QR3-2/tellis1.html>
- The ABC's of school-based mentoring: Effective strategies for providing quality youth mentoring in schools and communities. (2007). Retrieved from <http://educationnorthwest.org/sites/default/files/abcs.pdf>
- Tierney, J. P., Grossman, J. B., & Resch, N. L. (1995). *Making a difference: An impact study of Big Brothers Big Sisters*. Philadelphia, PA: Public/Private Ventures.
- Townsend, K.C., & McWhirter, B. T. (2011). Connectedness: A review of the literature with implications for counseling, assessment, and research. *Journal of Counseling & Development*, 83(2), 191–201. doi:10.1002/j.1556-6678.2005.tb00596.x

- Urdan, T., & Schoenfelder, E. (2006). Classroom effects on student motivation: Goal structures, social relationships, and competence beliefs. *Journal of School Psychology, 44*(2006), 331–349. Retrieved from <http://motivationallearningtheories.wikispaces.com/file/view/Urdan+Schoenfelder+2006.Pdf>
- Vygotsky, L. S. (1978). *Mind in society: The development of higher psychological processes*. Cambridge, MA: Harvard University Press.
- Walker, H. M., & Holmes, D. (1987). *The ACCESS program: Adolescent curriculum for communication and effective social skills: Student study guide*. Austin, TX: Pro-Ed.
- Wentzel, K. R., & Caldwell, K. (1997). Friendships, peer acceptance, and group membership: Relations to academic achievement in middle school. *Child Development, 68*(60), 1196–1209. doi:10.1111/j.1467-8624.1997.tb01994.x
- What is Link Crew? (n.d.) Retrieved from <http://www.boomerangproject.com/link/program-reach>
- Wiersma, W. (2000). *Research methods and education: An introduction*. Boston, MA: Allyn and Bacon.
- Williams, C. (2011). Mentoring and social skills training: Ensuring better outcomes for youth in foster care. *Child Welfare, 90*(1), 59–74. Retrieved from <http://search.proquest.com/openview/75a387b37d83bf827df8db6880ef370f/1?pq-origsite=gscholar>
- Williams, E., & Richman, S. (2007). *The first year of high school: A quick stats fact sheet*. Washington, DC: National High School Center. Retrieved from http://www.betterhighschools.org/docs/NHSC_TransitionsReport.pdf
- Willis, P., Bland, R., Manka, L., & Craft, C. (2012). The ABCs of peer mentoring: What secondary students have to say about cross-age peer mentoring in a regional Australian

- school. *Educational Research and Evaluation: An International Journal on Theory and Practice*, 18(2), 173–185. doi:10.1080/13803611.2011.650920
- Winters, L. (2013). *Transition to high school*. Retrieved from <http://www.pamf.org/teen/life/school/highschool.html>
- Woodward, A. T., Freddolino, P. P., & Wishart, D. J. (2012). Outcomes from a peer tutor model for teaching technology to older adults. *Ageing and Society*, 33 (8), pp. 1315-1338. doi:10.1017/S0144686X12000530
- Yin, R. (2003). *Case study research: Design and methods*. Thousand Oaks, CA: Sage Publications.
- Yin, R. (2008). *Case study research: Design and methods*. Thousand Oaks, CA: Sage Publications.
- Yin, R. (2014). *Case study research: Design and methods*. Thousand Oaks, CA: Sage Publications.

Appendix A: Mentor Application

MENTOR APPLICATION

Personal Information:

Name _____

Gender ☐ Male

☐ Female

Address _____

Street

City

State

ZIP

Home phone _____ Cell phone _____

E-mail address _____

Volunteer Information:

1. What do you feel are your strengths that you can bring to this program? How do you feel you can best support a 9th grader coming into our school?

2. Write a brief statement on why you have chosen to participate in the mentor program. Why do you want to become a mentor?

3. Have you been a volunteer before? ☐ Yes ☐ No If yes, where?

4. Do you prefer working with a ☐ Girl ☐ Boy ☐ No Preference

5. Do you prefer working with a quiet, reserved peer? ☐ Yes ☐ No ☐ No Preference

6. Do you prefer working with an outgoing peer? ☐ Yes ☐ No ☐ No Preference

7. Please list any hobbies or interests you may have: _____

8. What would you like to do with a mentee?

9. What clubs or groups, if any, do you belong to?

10. My favorite subject in school is

11. My least favorite subject in school is

12. Please put an X by the activities you enjoy the most:

___ Playing sports such as _____

___ Watching sports such as _____

___ Writing

___ Reading

___ Listening to music such as _____

___ Photography

___ Attending plays

___ Going to the movies

___ Arts and crafts

___ Visiting zoos and parks

___ Visiting museums

___ Using computers

___ Playing games

- ___ Cooking
- ___ Exploring possible careers
- ___ Hiking and seeing nature
- ___ Other _____

13. What qualities would you like in a mentee?

14. What individual has served as a role model for you? Why?

15. If you could recommend one book for your mentee to read, what would it be?

16. Initial the two statements below:

___ I understand that the mentor program involves registering and attending the scheduled peer mentoring class for which I will receive an elective credit.

___ I understand that I will be required to complete the mentor program orientation and at least two training sessions during the year.

Signature

Date

Adapted from materials provided by Mentoring Partnership of Long Island and Philadelphia, *The ABC's of Mentoring*.

Appendix B: Informed Consent Form

_____ Peer Mentoring Program

CONSENT FORM

This form will tell you about a research study in which students have the opportunity to participate. If you are a student, this form will ask **you** for permission to participate in this the study. A parent or guardian must give permission for children (a minor student under 18 years old) called “**your student**” to participate in the study.

Research Study Title: Peer-to-Peer Mentoring in the Rural High School Setting

Principle Investigator: Darlene M. Geddes
_____, Peer Mentoring Program

Research Institution: Concordia University – Portland
Dissertation committee Faculty Chair, Dr. Marty Bullis

Purpose of the Study

The purpose of _____ Peer Mentoring Program is to provide peer to peer mentoring to students. As part of these activities, the program is conducting research to learn how peer to peer mentoring impacts high school students. This study will begin in September 2015 and end in June 2016.

What You (Your Student) Will Be Doing

You (Your student) will be asked to complete a short survey three times at different points of the study. The surveys will ask questions about their connection to school and involvement in school and community activities. Each survey should take about 15 minutes to complete and will be done during the class session. You (Your student’s) name will not appear on the surveys. Students will also answer 10 interview questions about the peer mentoring program every four weeks. These questions will be repeated each interview. The interviews will be individual interviews and audio recorded for later transcription.

All audio taped interviews will be destroyed immediately after they have been transcribed. All study documents will be destroyed three years after this study has ended.

Risks

It is expected that both mentors and mentees will benefit from participating in this study. We expect that both mentors and mentees will experience increased self-esteem, school connection and positive school social skills due to their mentorship relationship. Additionally, students participating have the opportunity to earn a 0.50 elective credit.

There are no anticipated risks from you (your student) participating in this study. However, questions that may be asked could include asking how strongly students agree with the following statements:

My family has fun together.

I really like who I am.

I will have a good future.

I like my school.

These questions, although not expected to be disturbing, might cause some strong emotions or feelings. If the student wants to speak with a counselor after feeling strong emotions from a question asked in this study, a mental health counselor will be available. This counselor is _____, a _____ County Mental Health Therapist. _____ is available in the Counselling Office in _____ or by calling her office telephone number: XXX-XXX-XXXX.

Benefits

The benefit of this study is that we can learn how the peer to peer mentoring program can help you and more people.

By participating, you (your student) can receive a grade and elective credit from participation in the mentoring program. If you (your student) does NOT want to participate, he or she may still earn a grade and elective credit (0.50) in another manner.

Confidentiality

No person who is other than the investigator will know how the student answered the questions of the investigator. Information will be kept private, or confidential. The only exception of confidentiality is if the investigator is concerned with the student's immediate safety in a way that must be reported as required by law. The results of this study will not include the name or other identifying information from the student. All names and identifying information will be in locked file cabinets and will be destroyed when this study is over.

Right to Withdraw

Participation in this study is completely voluntary. You or your student may stop participating in the study at any time. Even if the student does not participate or chooses to withdraw from the study, he or she can continue to access the study center, work with a peer mentor and related activities provided by the _____ Peer Mentoring Program. The student can withdraw consent (discontinue participation) at any time and may choose to remain in the course or may choose to select a different elective course. If the student withdraws and selects a different elective course, the student can still earn a grade and elective credit of 0.50.

Contact Information and How to Ask Questions

You will receive a copy of this consent form, so you can review the research description and have contact information.

If you have any questions or concerns about this study or this consent form you may contact:

Darlene M. Geddes

[Contact Information]

To ask general questions or talk to a participant advocate, contact the Concordia University – Portland Institutional Review Board (Dr. OraLee Branch; email obranch@cu-portland.edu or call 503-493-6390).

Parental consent for minor students

I have read this description of this study in this consent form. If I had questions about the study, these questions were answered. I give my consent (permission) for my child (the student) to participate.

Print the Student's Name

Parent/Legal Guardian's Signature

Date

Student participant consent

I, the student, understand this study. If I had questions about the study, I have received answers to my questions. I want to participate in this research study, and I give my consent by signing below.

Student's Signature

Date

Appendix C: Timeline of Events

Event	People involved	Timing/Dates	Student Participants	Notes
Selection of mentors/mentees	Counselors, Behavior Support Specialist, Mental Health Therapist, Leadership Advisor	By 08/14/2015		
Training of staff	Counselors, Behavior Support Specialist, Mental Health Therapist, Leadership Advisor	By 08/14/2015		
Student Information Meeting 1	Counselors, Behavior Support Specialist, Mental Health Therapist, Leadership Advisor, Primary Researcher, Parents/selected students	09/03/2015	X	
Student Information Meeting 2	Primary Researcher, Behavioral Support Specialist	09/09/2015	X	
Completion of collection of informed consent	Primary Researcher	09/08/2015		
Training of mentors/mentees	Primary Researcher, Behavioral Support Specialist	09/11/2015	X	
Initial Survey	Behavior Support Specialist, Primary Researcher	09/14/2015	X	
Initial Interview	Primary Researcher	Week of 09/14/15	X	
Survey #2	Primary Researcher	10/26/2015	X	
Survey #3	Primary Researcher	11/23/2015	X	
Survey #4	Primary Researcher	012/14/2015	X	

Interview #2	Primary Researcher	Week of 10/26/2015	X	
Interview #3	Primary Researcher	Week of 11/23/2015	X	
Interview #4	Primary Researcher	Week of 12/14/2015	X	
Completion of analysis of results	Primary Researcher	By 1/15/2016	X	
Initial report for stakeholders	Primary Researcher reviewed by Counselors, Behavior Support Specialist, Mental Health Therapist, Leadership Advisor	By 1/22/2016	X	
Concluding meeting	Counselors, Behavior Support Specialist, Mental Health Therapist, Leadership Advisor, Primary Researcher	1/28/2016	X	

Appendix D: Field Notes

Descriptions	Reflections
<p>Focus on the research problem.</p> <p>Include greatest detail on aspects of the research problem and the theoretical methodology underpinning the research. Details about geography of the space, relations among persons and objects, activities participants are engaged in, and atmosphere or tone of site.</p>	<p>Focus on thoughts and insights.</p> <p>Complete after the observations when you have time to consider their importance. Record thoughts, ideas, questions, and concerns. Include insights about what you have observed and speculate as to why specific phenomenon occurred.</p>

Appendix E: Interview Questions and Protocol

To facilitate my note-taking, I would like to audio tape our conversation today. For your information, only researchers on the projects will listen to the tapes which we will destroy after they are transcribed. The form that you signed is devised to meet our human subject's research standards and explains that: all your information will be held confidential, your participation is voluntary, you may stop at any time if you feel uncomfortable, and the principal investigator (this is me) does not intend to inflict any harm or discomfort. I am very appreciative of your participation.

I have planned this interview to last no more than 30 minutes. During this time, I have 10 questions that I would like to cover. If time begins to run short, I will let you know that we only have a specific amount of time left so that we complete all of the questions.

You have been selected to speak with me because you have been identified as a participant in the peer mentoring program. My research project focuses on how students are impacted in the areas of self-esteem, school connectedness and social capital when participating in a peer mentoring program. My study does not aim to make judgments about students individually but rather about how peer mentoring impacts students. I am trying to learn more about how to help students transition to high school, build student self-esteem, school connectedness and social capital.

The following questions will be asked of each individual participant in a private, confidential setting. Each interview will be audio-recorded for verbatim transcription after the interviews.

Appendix E (Continued): Interview Questions and Protocol

Participant Code: _____

Interview #: _____

Date: _____

1. Describe your relationship with your peer mentoring partner.
2. Describe the activities that you have been involved in with your peer mentoring partner over the past four weeks.
3. Do you feel connected to your school? Do you feel as if you belong?
4. What are things that do or do not help you feel connected, or as if you belong?
5. What activities are you involved in outside of regular academic classes? How did you become involved in these activities?
6. Are there barriers present that prevent you from becoming involved in extracurricular activities at this time?
7. Do you enjoy the peer mentoring program? Why or Why not?
8. How has the peer mentoring program impacted you as of this point?
9. What do you see as your greatest qualities and strengths?
10. How do you see yourself using your skills and strengths in the future?

Appendix F: The Hemingway Measure of Adolescent Connectedness Survey Short

Used with author permission



The Hemingway Measure of Adolescent Connectedness®

(MAC 5 Adolescent, grades 6-12)
M. J. Karcher, Ed.D., Ph.D., University of Texas at San Antonio

Adolescent Version A

MARKING INSTRUCTIONS

- Use number 2 pencil only.
- Make dark marks that fill the circle completely.
- Erase cleanly any mark you wish to change.
- Make no stray marks.



Correct
☐ ☒ ☐

Incorrect
☒ ☐ ☐

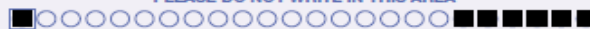
Name:		Number:		Date:	
Sex:	<input type="radio"/> Male <input type="radio"/> Female	Grade:	<input type="radio"/> 6 <input type="radio"/> 7 <input type="radio"/> 8 <input type="radio"/> 9 <input type="radio"/> 10 <input type="radio"/> 11 <input type="radio"/> 12	Age:	
Race/Ethnicity:	<input type="radio"/> White <input type="radio"/> Black <input type="radio"/> Hispanic <input type="radio"/> Asian <input type="radio"/> Bi-racial <input type="radio"/> Other: _____				
Who do you live with?	<input type="radio"/> Mother <input type="radio"/> Father <input type="radio"/> Both <input type="radio"/> Other: _____				

Please use this survey to tell us about yourself. Read each statement. MARK the number that best describes how true that statement is for you or how much you agree with it. If a statement is unclear to you, ask for an explanation. If it is still unclear, mark the "?".

"How TRUE about you is each sentence?"

	Not at all true	Not really true	Sort of true	True	Very true	? Unclear
(1) I like hanging out around where I live (like in my neighborhood).	1	2	3	4	5	?
(2) Spending time with friends is not so important to me.	1	2	3	4	5	?
(3) I can name 5 things that others like about me.	1	2	3	4	5	?
(4) My family has fun together.	1	2	3	4	5	?
(5) I have a lot of fun with my brother(s) or sister(s). (leave blank if you have none)	1	2	3	4	5	?
(6) I work hard at school.	1	2	3	4	5	?
(7) My classmates often bother me.	1	2	3	4	5	?
(8) I care what my teachers think of me.	1	2	3	4	5	?
(9) I will have a good future.	1	2	3	4	5	?
(10) I enjoy spending time by myself reading.	1	2	3	4	5	?
(11) I spend a lot of time with kids around where I live.	1	2	3	4	5	?
(12) I have friends I'm really close to and trust completely.	1	2	3	4	5	?
(13) There is not much that is unique or special about me.	1	2	3	4	5	?
(14) It is important that my parents trust me.	1	2	3	4	5	?
(15) I feel close to my brother(s) or sister(s). (leave blank if you have none)	1	2	3	4	5	?

PLEASE DO NOT WRITE IN THIS AREA



SERIAL #

	Not at all true	Not really true	Sort of true	True	Very true	? Unclear
(16) I enjoy being at school.	1	2	3	4	5	?
(17) I like pretty much all of the other kids in my grade.	1	2	3	4	5	?
(18) I do not get along with some of my teachers.	1	2	3	4	5	?
(19) Doing well in school will help me in the future.	1	2	3	4	5	?
(20) I like to read.	1	2	3	4	5	?
(21) I get along with the kids in my neighborhood.	1	2	3	4	5	?
(22) Spending time with my friends is a big part of my life.	1	2	3	4	5	?
(23) I can name 3 things that other kids like about me.	1	2	3	4	5	?
(24) I enjoy spending time with my parents.	1	2	3	4	5	?
(25) I enjoy spending time with my brothers/sisters. (leave blank if you have none)	1	2	3	4	5	?
(26) I get bored in school a lot.	1	2	3	4	5	?
(27) I like working with my classmates.	1	2	3	4	5	?
(28) I want to be respected by my teachers.	1	2	3	4	5	?
(29) I do things outside of school to prepare for my future.	1	2	3	4	5	?
(30) I never read books in my free time.	1	2	3	4	5	?
(31) I often spend time playing or doing things in my neighborhood.	1	2	3	4	5	?
(32) My friends and I talk openly with each other about personal things.	1	2	3	4	5	?
(33) I really like who I am.	1	2	3	4	5	?
(34) My parents and I disagree about many things.	1	2	3	4	5	?
(35) I try to spend time with my brothers/sisters when I can. (leave blank if you have none)	1	2	3	4	5	?
(36) I do well in school.	1	2	3	4	5	?
(37) I get along well with the other students in my classes.	1	2	3	4	5	?
(38) I try to get along with my teachers.	1	2	3	4	5	?
(39) I do lots of things to prepare for my future.	1	2	3	4	5	?
(40) I often read when I have free time.	1	2	3	4	5	?
(41) I hang out a lot with kids in my neighborhood.	1	2	3	4	5	?
(42) I spend as much time as I can with my friends.	1	2	3	4	5	?
(43) I have special hobbies, skills, or talents.	1	2	3	4	5	?
(44) My parents and I get along well.	1	2	3	4	5	?
(45) I try to avoid being around my brother/sister(s). (leave blank if you have none)	1	2	3	4	5	?
(46) I feel good about myself when I am at school.	1	2	3	4	5	?
(47) I am liked by my classmates.	1	2	3	4	5	?
(48) I always try hard to earn my teachers' trust.	1	2	3	4	5	?
(49) I think about my future often.	1	2	3	4	5	?
(50) I usually like my teachers.	1	2	3	4	5	?
(51) My neighborhood is boring.	1	2	3	4	5	?
(52) My friends and I spend a lot of time talking about things.	1	2	3	4	5	?
(53) I have unique interests or skills that make me interesting.	1	2	3	4	5	?
(54) I care about my parents very much.	1	2	3	4	5	?
(55) What I do now will not affect my future.	1	2	3	4	5	?
(56) Doing well in school is important to me.	1	2	3	4	5	?
(57) I rarely fight or argue with the other kids at school.	1	2	3	4	5	?

Appendix G: Peer Mentoring Recruitment Flyer

Peer Mentors needed for new mentorship program with incoming
9th graders!

Who? Juniors

When? Information meeting for interested students on: **September 3, 2015**

*****APPLICATIONS DUE SEPTEMBER 9TH!*****

What? Work with and mentor 9th graders to help them have a smooth transition into high school. Lead small group activities and discussions on high school transition.

Where? [Site Name]

What are the benefits?

- Experience to put on job applications!
- Get leadership experience to put on college and scholarship applications!
- Class of 2017 will be able to fulfill required career service hours for senior culminating project!
- Earn elective credit for enrollment and participation in Peer Mentoring class!

Figure 3. Initial Codes

	Academic Sup	Awareness of	Belonging/ser	Fulfilling to h	New activities	Relationships	School conne	Self in future	Self in present	Sense of belo	Servant Leade	Social Capital	Social Capital	Time as a barr
Academic Support/Tutori		5 - 0.07	n/a	n/a	2 - 0.05	12 - 0.15	6 - 0.08	n/a	2 - 0.03	2 - 0.04	5 - 0.06	2 - 0.03	8 - 0.08	n/a
Awareness of others' need	5 - 0.07		n/a	11 - 0.17	1 - 0.02	9 - 0.09	1 - 0.01	6 - 0.08	5 - 0.06	3 - 0.04	19 - 0.22	11 - 0.16	14 - 0.13	1 - 0.02
Belonging/sense of family	n/a	n/a		n/a	n/a	3 - 0.04	2 - 0.03	n/a	n/a	1 - 0.03	1 - 0.01	n/a	1 - 0.01	n/a
Fulfilling to help	n/a	11 - 0.17	n/a		n/a	7 - 0.08	3 - 0.04	3 - 0.05	2 - 0.03	1 - 0.02	7 - 0.08	4 - 0.07	9 - 0.10	n/a
New activities	2 - 0.05	1 - 0.02	n/a	n/a		2 - 0.03	4 - 0.07	n/a	n/a	1 - 0.03	n/a	2 - 0.05	2 - 0.03	n/a
Relationships	12 - 0.15	9 - 0.09	3 - 0.04	7 - 0.08	2 - 0.03		7 - 0.06	1 - 0.01	7 - 0.08	3 - 0.03	14 - 0.13	4 - 0.04	16 - 0.13	1 - 0.01
School connection thru ac	6 - 0.08	1 - 0.01	2 - 0.03	3 - 0.04	4 - 0.07	7 - 0.06		n/a	n/a	14 - 0.21	2 - 0.02	6 - 0.07	16 - 0.14	n/a
Self in future	n/a	6 - 0.08	n/a	3 - 0.05	n/a	1 - 0.01	n/a		4 - 0.06	n/a	9 - 0.11	8 - 0.14	12 - 0.13	n/a
Self in present	2 - 0.03	5 - 0.06	n/a	2 - 0.03	n/a	7 - 0.08	n/a	4 - 0.06		n/a	4 - 0.04	2 - 0.03	3 - 0.03	n/a
Sense of belonging	2 - 0.04	3 - 0.04	1 - 0.03	1 - 0.02	1 - 0.03	3 - 0.03	14 - 0.21	n/a	n/a		4 - 0.05	6 - 0.11	8 - 0.09	n/a
Servant Leadership	5 - 0.06	19 - 0.22	1 - 0.01	7 - 0.08	n/a	14 - 0.13	2 - 0.02	9 - 0.11	4 - 0.04	4 - 0.05		8 - 0.09	34 - 0.34	2 - 0.03
Social Capital	2 - 0.03	11 - 0.16	n/a	4 - 0.07	2 - 0.05	4 - 0.04	6 - 0.07	8 - 0.14	2 - 0.03	6 - 0.11	8 - 0.09		2 - 0.02	n/a
Social Capital/Volunteeris	8 - 0.08	14 - 0.13	1 - 0.01	9 - 0.10	2 - 0.03	16 - 0.13	16 - 0.14	12 - 0.13	3 - 0.03	8 - 0.09	34 - 0.34	2 - 0.02		3 - 0.04
Time as a barrier	n/a	1 - 0.02	n/a	n/a	n/a	1 - 0.01	n/a	n/a	n/a	n/a	2 - 0.03	n/a	3 - 0.04	

Figure 3: The initial codes in ATLAS.ti as viewed in the co-occurrence table with in-vivo coding (direct quotes).

Figure 4. Final Codes

	Belonging/ser	Fulfilling to he	Relationships	School connec	Self in future	Self in present	Servant Leade	Social Capital
Academic Support/Tutori	2 - 0.03	n/a	12 - 0.15	6 - 0.08	n/a	2 - 0.03	5 - 0.06	10 - 0.08
Awareness of others' need	3 - 0.03	11 - 0.15	10 - 0.09	1 - 0.01	6 - 0.07	5 - 0.06	20 - 0.21	26 - 0.19
Belonging/sense of family		1 - 0.02	6 - 0.07	16 - 0.22	n/a	n/a	5 - 0.06	14 - 0.11
Fulfilling to help	1 - 0.02		7 - 0.08	3 - 0.04	3 - 0.05	2 - 0.03	7 - 0.08	13 - 0.11
Relationships	6 - 0.07	7 - 0.08		7 - 0.06	1 - 0.01	7 - 0.08	14 - 0.13	20 - 0.13
School connection thru ac	16 - 0.22	3 - 0.04	7 - 0.06		n/a	n/a	2 - 0.02	22 - 0.16
Self in future	n/a	3 - 0.05	1 - 0.01	n/a		4 - 0.06	9 - 0.11	20 - 0.17
Self in present	n/a	2 - 0.03	7 - 0.08	n/a	4 - 0.06		4 - 0.04	5 - 0.04
Servant Leadership	5 - 0.06	7 - 0.08	14 - 0.13	2 - 0.02	9 - 0.11	4 - 0.04		41 - 0.33
Social Capital	14 - 0.11	13 - 0.11	20 - 0.13	22 - 0.16	20 - 0.17	5 - 0.04	41 - 0.33	

Figure 4: Final codes in ATLAS.ti as viewed in the co-occurrence table with in-vivo coding (direct quotes).

Figure 5. Student Leadership and Social Capital

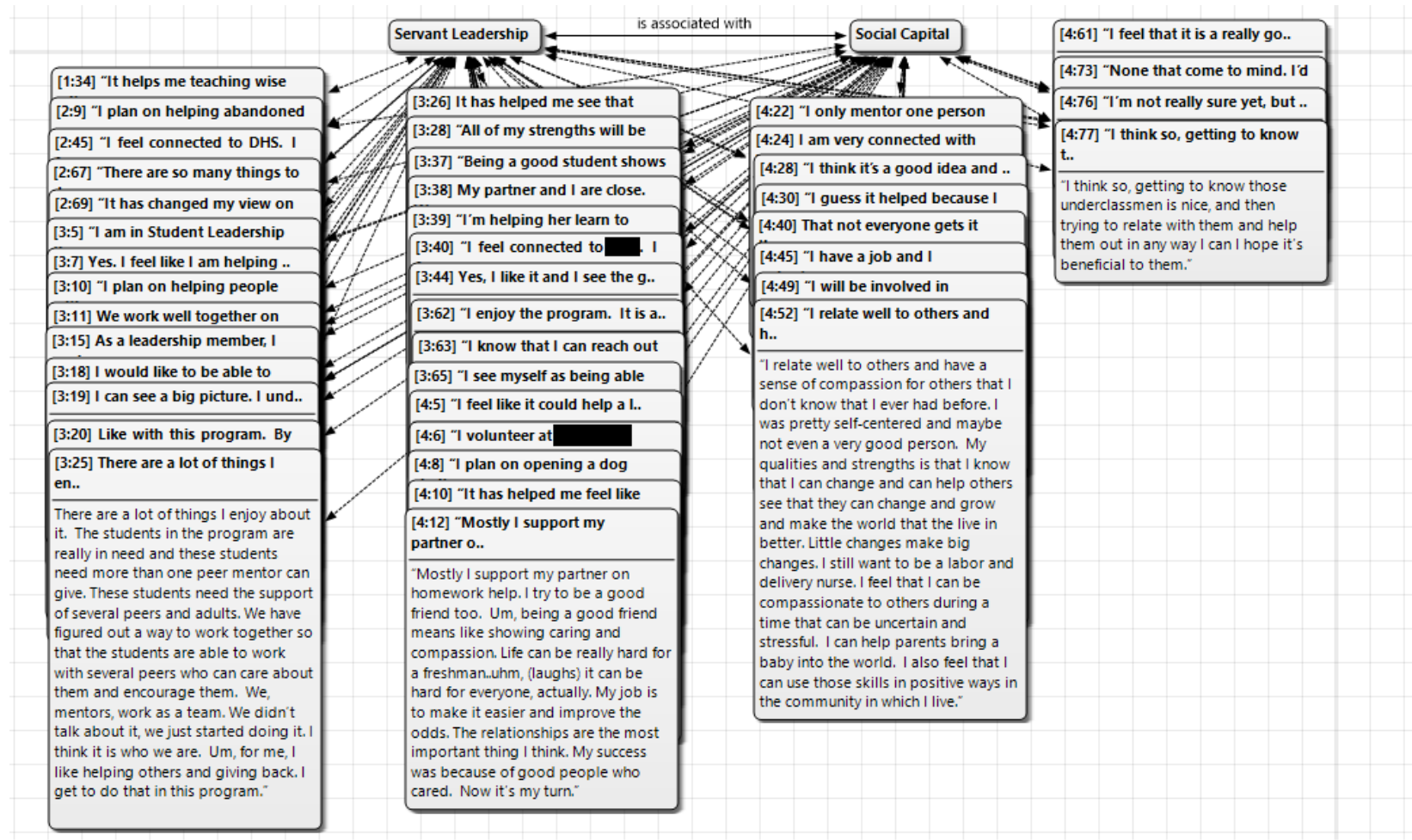


Figure 5: This figure represents the 41 in-vivo codes co-occurring in ATLAS.ti connecting Servant Leadership and Social Capital.

Figure 6. School Connection through Activities and Social Capital

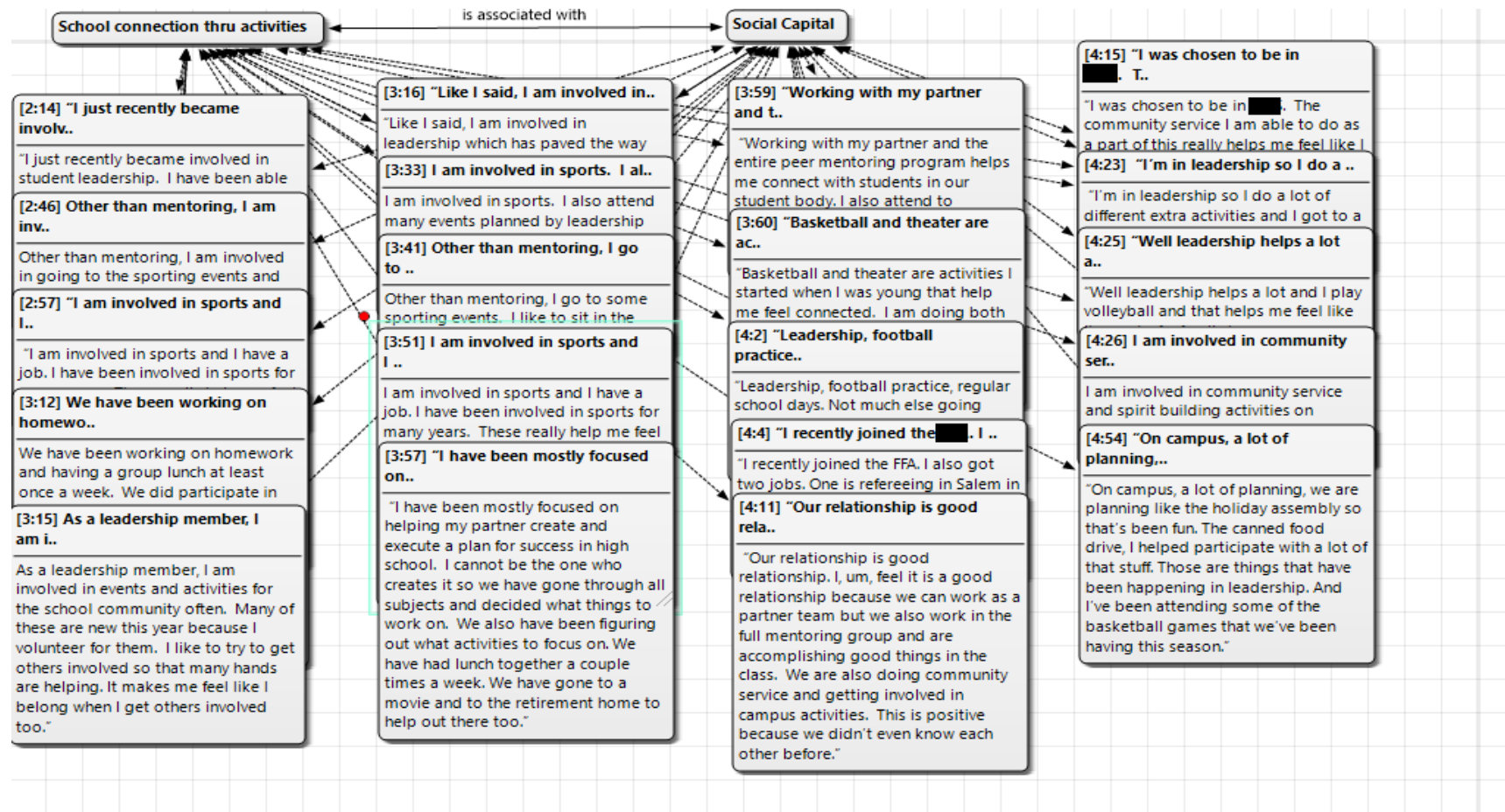


Figure 6: This figure represents the 22 in-vivo codes co-occurring in ATLAS.ti connecting School Connection through Activities and Social Capital.

Figure 7. Belonging/Sense of Family and School Connection through Activities

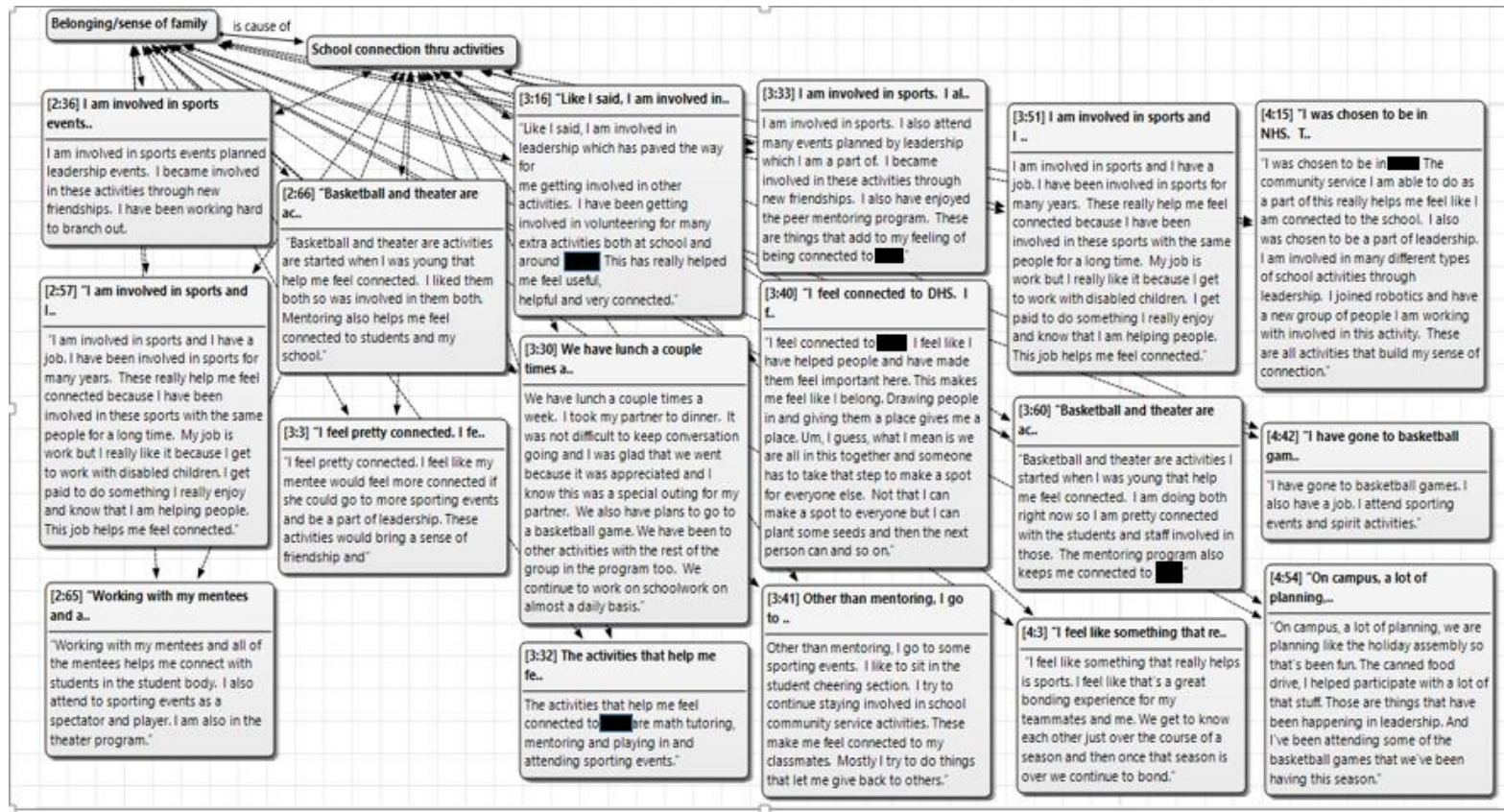


Figure 7: This figure represents the 16 in-vivo codes co-occurring in ATLAS.ti connecting Belonging/Sense of Family and School Connectedness through Activities.

Figure 8. Relationships and Servant Leadership

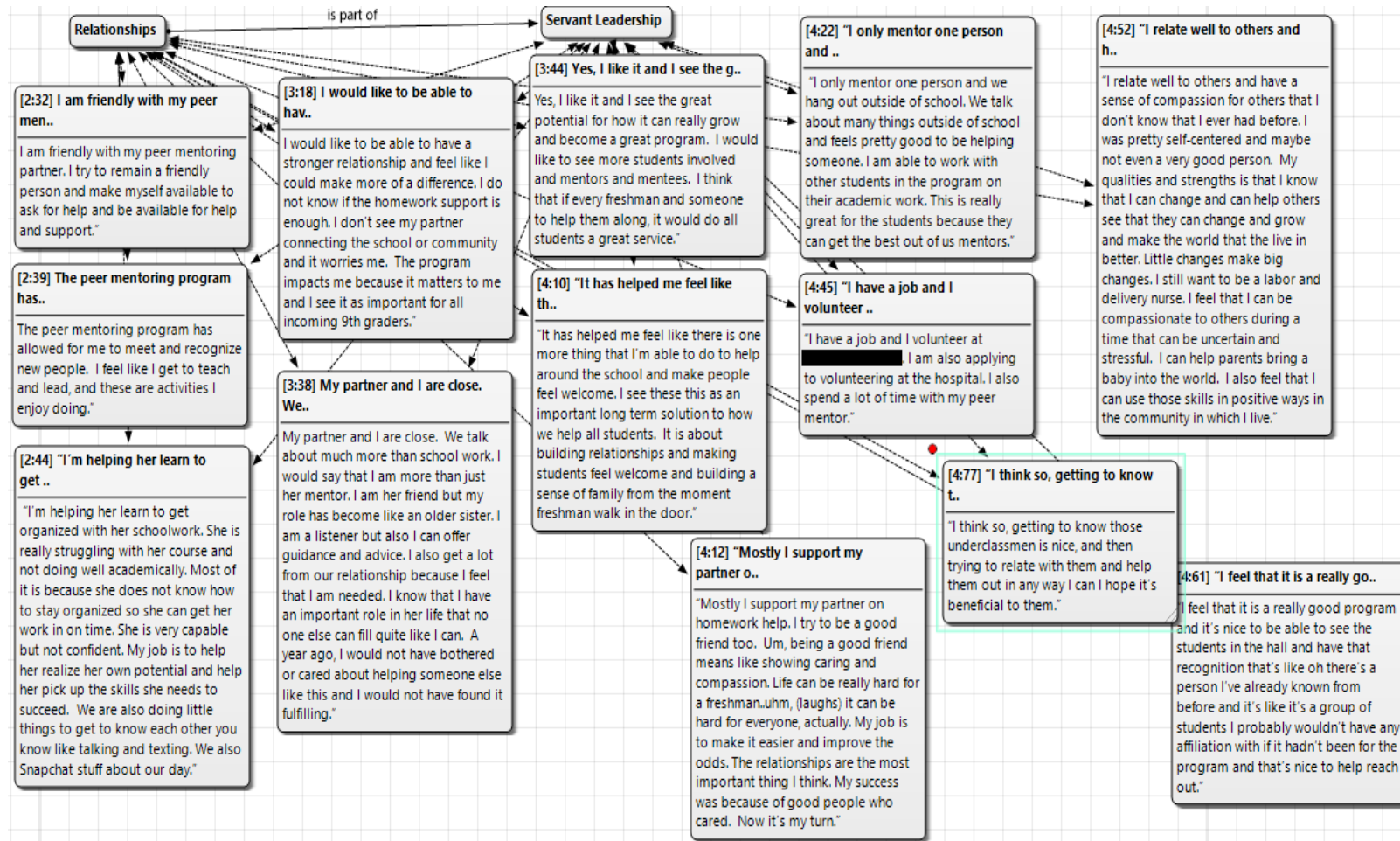


Figure 8: This figure represents the 14 in-vivo codes co-occurring in ATLAS.ti connecting Relationships and Servant Leadership.

Figure 9. Social Capital and Awareness of Others' Needs

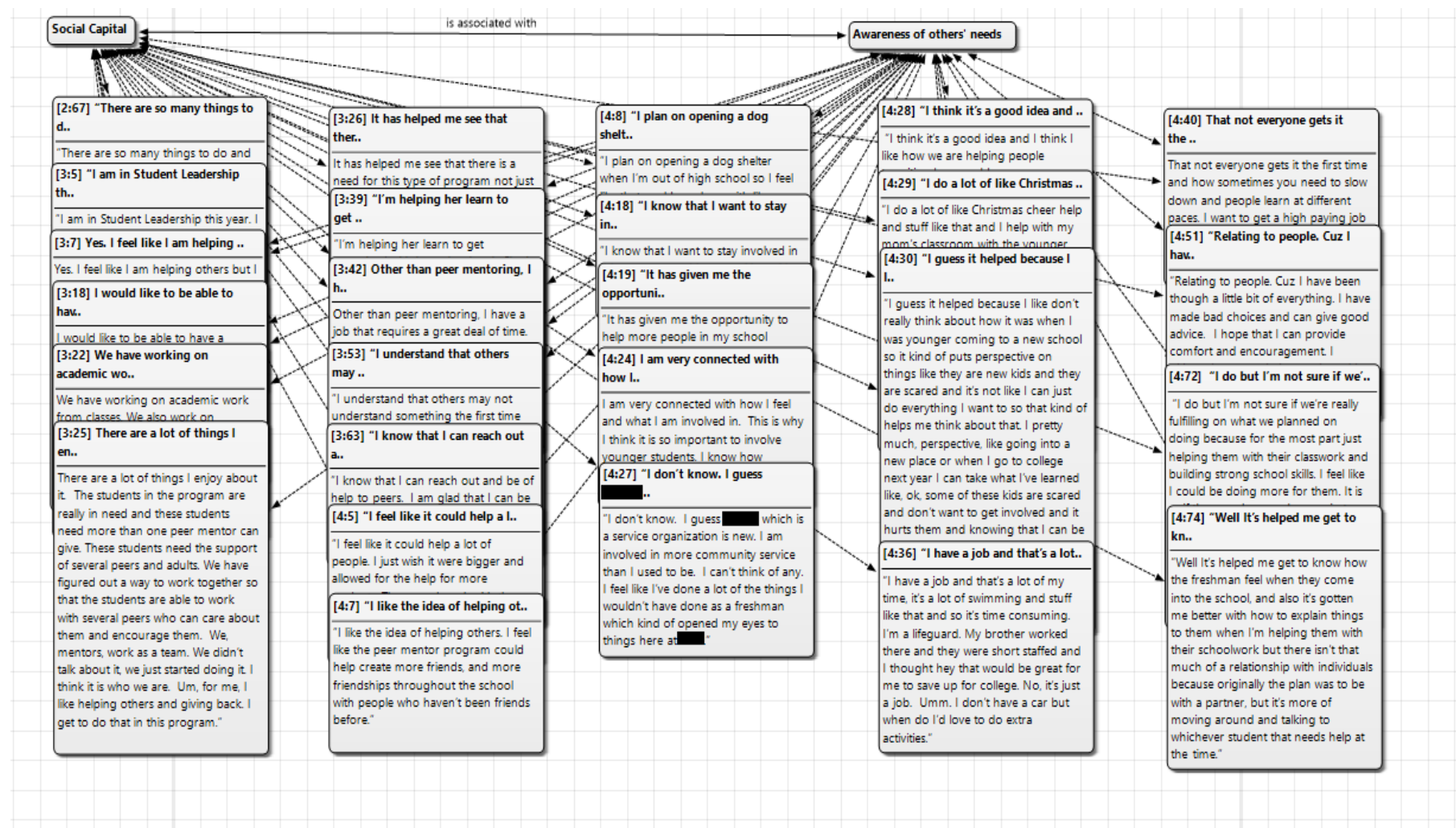


Figure 9: This figure represents the 26 in-vivo codes co-occurring in ATLAS.ti connecting Social Capital and Awareness of Others' Needs.

Figure 10. Relationships and Social Capital

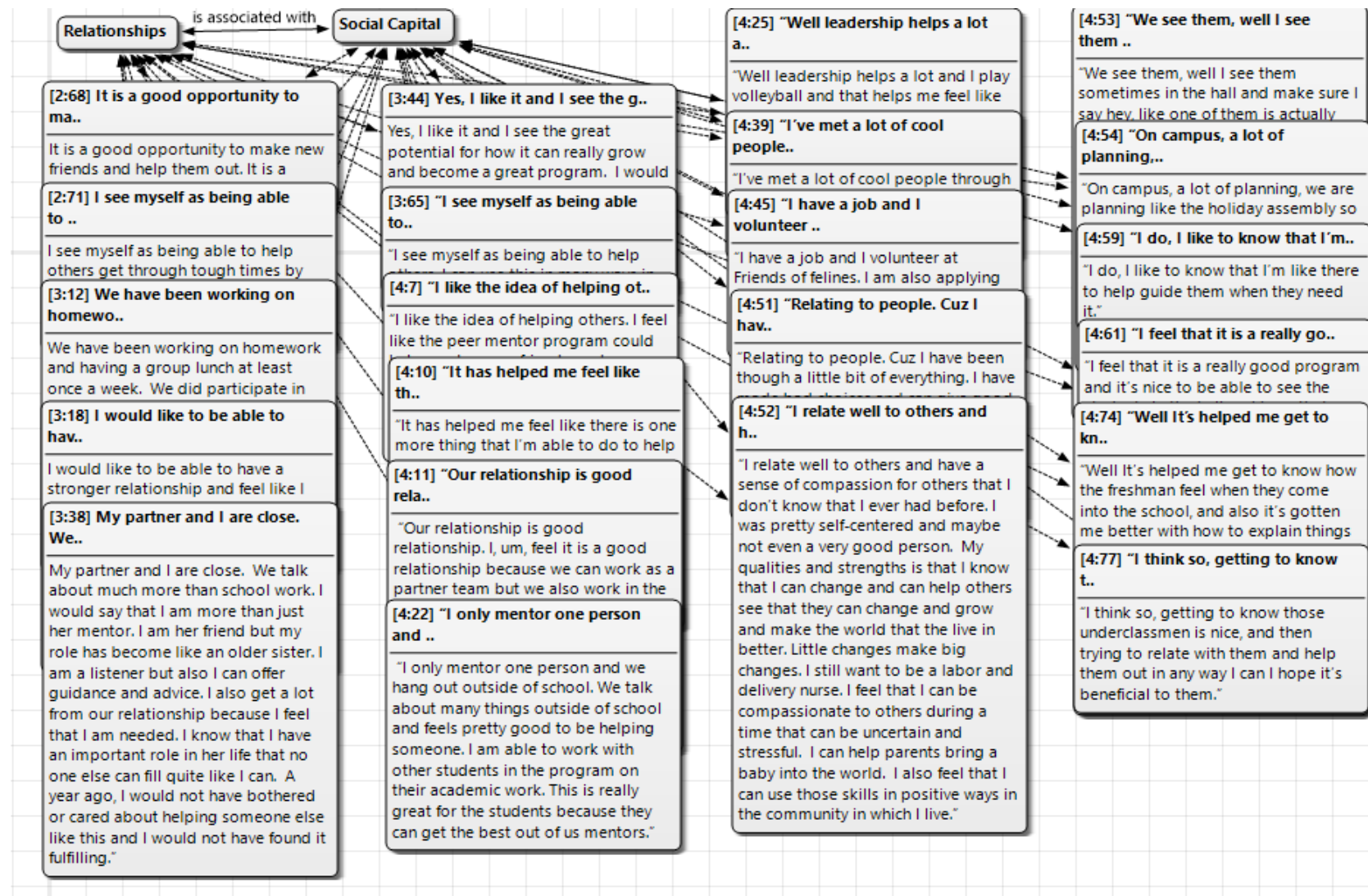


Figure 10: This figure represents the 20 in-vivo codes co-occurring in ATLAS.ti connecting Relationships and Social Capital